

**Iowa Department of Natural Resources  
Title V Operating Permit**

**Name of Permitted Facility: Iowa State University  
(Central Campus)**

**Facility Location: Ames, Iowa**

**Air Quality Operating Permit Number: 04-TV-014**

**Expiration Date: August 8, 2009**

**EIQ Number: 92-6867**

**Facility File Number: 85-01-007**

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**Responsible Official**

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This permit is issued in accordance with 567 Iowa Administrative Code Chapter 22, and is issued subject to the terms and conditions contained in this permit.

**For the Director of the Department of Natural Resources**

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Douglas A. Campbell, Supervisor of Air Operating Permits Section

Date

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## Abbreviations

acfm.....	actual cubic feet per minute
CFR .....	Code of Federal Regulation
CE.....	control equipment
CEM .....	continuous emission monitor
°F .....	degrees Fahrenheit
EIQ .....	emissions inventory questionnaire
EP .....	emission point
EU.....	emission unit
gph.....	gallons per hour
gr./dscf.....	grains per dry standard cubic foot
gr./100 cf .....	grains per one hundred cubic feet
IAC .....	Iowa Administrative Code
IDNR .....	Iowa Department of Natural Resources
MMBtu/hr.....	million Btu's per hour
MVAC .....	motor vehicle air conditioner
N/A.....	not applicable
NAICS .....	North American Industry Classification System
NSPS .....	new source performance standard
ppmv.....	parts per million by volume
lb./hr .....	pounds per hour
lb./MMBtu.....	pounds per million British thermal units
SCC .....	Source Classification Codes
scfm .....	standard cubic feet per minute
SIC.....	Standard Industrial Classification
TPY .....	tons per year
UG.....	underground
USEPA .....	United States Environmental Protection Agency

## **Pollutants**

PM .....	particulate matter
PM <sub>10</sub> .....	particulate matter ten microns or less in diameter
SO <sub>2</sub> .....	sulfur dioxide
NO <sub>x</sub> .....	nitrogen oxides
VOC.....	volatile organic compound
CO .....	carbon monoxide
HAP.....	hazardous air pollutant

# I I. Facility Description and Equipment List

Facility Name: Iowa State University (Central Campus)  
Permit Number: 04-TV-014

Facility Description: University (SIC 8221)

## Equipment List

### A. Natural Gas Fired Generators

Emission Point Number	Emission Unit Number	Emission Unit Description	IDNR Construction Permit Number
EP203	EU203	Agronomy Hall Emergency Generator	04-A-278
EP204	EU204	Black Engineering Building Emergency Generator	04-A-279
EP205	EU205	Molecular Biology Emergency Generator	04-A-280
EP208	EU208	Sweeny Hall Emergency Generator	04-A-281

### B. Diesel Fired Generators

Emission Point Number	Emission Unit Number	Emission Unit Description	IDNR Construction Permit Number
EP217	EU217	Veterinary Medicine Emergency Generator	04-A-285
EP246	EU246	Intensive Livestock Research and Instruction Facilities Emergency Generator	98-A-458
EP337	EU337	Howe Hall Emergency Generator	99-A-316
EP338	EU338	Maple Hall Emergency Generator	99-A-324
EP352	EU352	Livestock Infectious Disease Isolation Facility Emergency Generator	98-A-1086

### C. Permitted Boilers

Emission Point Number	Emission Unit Number	Emission Unit Description	IDNR Construction Permit Number
EP210	EU210a	Wallace-Wilson Boiler #1 – Fuel Oil Combustion	04-A-282
	EU210	Wallace-Wilson Boiler #1 – Natural Gas Combustion	
	EU211a	Wallace-Wilson Boiler #2-Fuel Oil Combustion	
	EU211	Wallace-Wilson Boiler #2-Natural Gas Combustion	
EP212	EU212	Veterinary Medicine Boiler #3	04-A-283
EP213	EU213	Veterinary Medicine Boiler #1	04-A-284

#### D. Grandfathered Boilers

Emission Point Number	Emission Unit Number	Emission Unit Description	IDNR Construction Permit Number
EP333	EU333a	Applied Science I-Boiler #1-Fuel Oil Combustion	N/A
	EU333	Applied Science I-Boiler #1-Natural Gas Combustion	
EP334	EU334a	Applied Science I-Boiler #2-Fuel Oil Combustion	N/A
	EU334	Applied Science I-Boiler #1-Natural Gas Combustion	
EP335	EU335a	Knapp-Storms-Boiler #1-Fuel Oil Combustion	N/A
	EU335	Knapp-Storms-Boiler #1-Natural Gas Combustion	
	EU336a	Knapp-Storms-Boiler #2-Fuel Oil Combustion	N/A
	EU336	Knapp-Storms-Boiler #2-Natural Gas Combustion	

#### E. Paint Spray Booths

Emission Point Number	Emission Unit Number	Emission Unit Description	IDNR Construction Permit Number
EP220	EU220	General Services Paint Spray Booth	04-A-286
EP339	EU339	Howe Hall Paint Spray Booth	00-A-659

#### F. Smokehouses

Emission Point Number	Emission Unit Number	Emission Unit Description	IDNR Construction Permit Number
EP236	EU236	Meats Lab Smokehouse #1	04-A-289
EP237	EU237	Meats Lab Smokehouse #2	00-A-290

#### G. Woodworking Shop

Emission Point Number	Emission Unit Number	Emission Unit Description	IDNR Construction Permit Number
EP230	EU230	Woodworking	04-A-288
EP230a	EU230a	Dust Collection Dumpster	00-A-289

#### H. Miscellaneous Sources

Emission Point Number	Emission Unit Number	Emission Unit Description	IDNR Construction Permit Number
EP200	EU200	Veterinary Medicine Incinerator	75-A-368-S3
EP235	EU235	Linear Accelerator	03-A-1061

## H. Miscellaneous Sources (Cont.)

Emission Point Number	Emission Unit Number	Emission Unit Description	IDNR Construction Permit Number
EP244	EU243	Collection Cyclone	04-A-291
	EU244	Metal Atomizer	
	EU245	Collection Cyclone	
EP250	EU250	Parks Library Non-Aqueous Deacidification System	03-A-1056
EP256	EU256	Walk-In Fume Hood	03-A-1059

### Insignificant Activities Equipment List

Insignificant Emission Unit Number	Insignificant Emission Unit Description
EU202	LIDIF Boiler
EU206	Soil Tilth Emergency Generator
EU207	Black Eng Ceramic Heat Press
EU209	Knapp-Storms UG. Diesel Storage Tank (12,000 gal)
EU218	Vet. Med Complex-Wood/Metal/Plastic Shop
EU221	Hilton Paint Spray Booth
EU222	Durham Center Hood-Cleaner Vapors
EU223	Bessey Hall Wood Shop
EU226	N. Hangar UG. Jet Kerosene Storage Tank (10,000 gal.)
EU227	Black Eng. Paint Spray Booth
EU231	Secondary Metal Smelting
EU232	Parts Washer
EU233	Foundry
EU234	Woodworking
EU238	Trans. Services UG Diesel Storage Tank #1 (10,000 gal.)
EU239 <sup>(1)</sup>	Underground Gasoline Storage Tank (20,000 gal.)
EU251	Poultry Science Incinerator
EU259	Lied Rec.-Emergency Generator (Diesel-2.3 gph)
EU261	ILR&I Skid Mounted Storage Tank
EU265	Olsen Bldg. Maintenance
EU266	Hilton Coliseum Woodworking
EU267	Gilman Hall Machine Shop
EU270	Agronomy G.H.-Emergency Generator (Nat. Gas 0.60 MMBtu/hr)
EU271	Durham-Emergency Generator (Nat. Gas 2.5 MMBtu/hr)
EU272	Food Sciences-Emergency Generator (Nat. Gas 0.68 MMBtu/hr)
EU273	Gilman Hall-Emergency Generator (Nat. Gas 0.53 MMBtu/hr)
EU275	Heady Hall Emergency Generator (Nat. Gas 0.18 MMBtu/hr)

<sup>(1)</sup> IDNR Construction Permit 03-A-1060 for this emission unit does not contain any specific terms or conditions, therefore the emission unit qualifies as an insignificant activity per 567 IAC 22.103.

<b>Insignificant Emission Unit Number</b>	<b>Insignificant Emission Unit Description</b>
EU276	Hilton Coliseum Emergency Generator (Nat. Gas 1.9 MMBtu/hr)
EU277	LeBaron Hall Emergency Generator (Nat. Gas 1.93 MMBtu/hr)
EU278	Meats Lab Emergency Generator (Nat. Gas 0.53 MMBtu/hr)
EU279	Meats Lab Emergency Generator (Nat. Gas 0.53 MMBtu/hr)
EU280	Phys Ed.. Emergency Generator (Nat. Gas 0.82 MMBtu/hr)
EU281	Physics Hall Emergency Generator (2.5 kw)
EU282	Research Park Emergency Generator (Nat. Gas 0.55 MMBtu/hr)
EU283	Ross Hall Emergency Generator (Nat. Gas 0.23 MMBtu/hr)
EU284	Ross Hall Emergency Generator (Nat. Gas 0.23 MMBtu/hr)
EU285	Student Services Emergency Generator (Nat. Gas 0.60 MMBtu/hr)
EU286	Town Engineering Emergency Generator (Nat. Gas 0.23 MMBtu/hr)
EU287	Vet Institute #40 Emergency Generator (Nat. Gas 1.59 MMBtu/hr)
EU288	Vet Institute #16 Emergency Generator (Nat. Gas 1.59 MMBtu/hr)
EU290	Barton Hall Emergency Generator (Nat. Gas 0.09 MMBtu/hr)
EU291	Birch-Welch-Roberts Emergency Generator (Nat. Gas 0.23 MMBtu/hr)
EU292	Buchanan Hall Emergency Generator (Nat. Gas 0.14 MMBtu/hr)
EU293	Fisher-Nickel Hall Emergency Generator (Nat. Gas 0.12 MMBtu/hr)
EU294	Freeman Hall Emergency Generator (Nat. Gas 0.09 MMBtu/hr)
EU295	Friley Hall North Emergency Generator (Nat. Gas 0.26 MMBtu/hr)
EU296	Friley Hall South Emergency Generator (Nat. Gas 0.20 MMBtu/hr)
EU297	Helser Hall Emergency Generator (#2 Fuel Oil 2.3 gph)
EU298	Knapp Hall Emergency Generator (Nat. Gas 0.14 MMBtu/hr)
EU300	Larch Hall Emergency Generator (#2 Fuel Oil 5 kw)
EU301	Linden Hall Emergency Generator (Nat. Gas 0.26 MMBtu/hr)
EU302	Lyon Hall Emergency Generator (Nat. Gas 0.09 MMBtu/hr)
EU303	Maple Hall Emergency Generator (Nat. Gas 0.14 MMBtu/hr)
EU304	Oak-Elm Hall Emergency Generator (#2 Fuel Oil 0.64 gph)
EU305	Storms Hall Emergency Generator (Nat. Gas 0.14 MMBtu/hr)
EU306	Wallace Hall Emergency Generator (Nat. Gas 0.14 MMBtu/hr)
EU308	Willow Hall Emergency Generator (Nat. Gas 0.14 MMBtu/hr)
EU309	Wilson Hall Emergency Generator (Nat. Gas 0.14 MMBtu/hr)
EU310	Design College Firing Kiln No.1
EU311	Design College Firing Kiln No.2
EU314	Sweeney Glass Blowing Furnace #3
EU315	Gilman Hall Kiln
EU318	Knoll Boiler (Nat. Gas, 0.48 MMBtu)
EU321	Vet. Med. Research Institute (VMRI) Boiler #1 (Nat. Gas, 2.25 MMBtu/hr)
EU322	VMRI Boiler #11 (Nat. Gas, 0.40 MMBtu/hr)
EU323	VMRI Boiler #12 (0.163 MMBtu/hr)
EU324	VMRI Boiler #29 (Nat. Gas, 0.88 MMBtu/hr)
EU325	VMRI Animal Holding Boiler #1 (Nat. Gas, 2.1 MMBtu/hr)
EU326	VMRI Animal Holding Boiler #2 (Nat. Gas, 2.1 MMBtu/hr)
EU327	Engineering Extension Services Boiler (Nat. Gas, 0.25 MMBtu/hr)
EU328	Administrative Services Boiler #1 (Nat. Gas, 0.75 MMBtu/hr)
EU329	Administrative Services Boiler #2 (Nat. Gas, 0.75 MMBtu/hr)
EU330	Olsen Building Boiler (Nat. Gas, 4.25 MMBtu/hr)

<b>Insignificant Emission Unit Number</b>	<b>Insignificant Emission Unit Description</b>
EU331	Ruminant Nutrition Lab Boiler #1 (Nat. Gas, 0.54 MMBtu/hr)
EU332	Ruminant Nutrition Lab Boiler #2 (Nat. Gas, 0.54 MMBtu/hr)
EU340	VMRI Above Ground Tank (Gasoline 200 gal.)
EU341	Veenker Golf Course Storage Tank
EU342	Veenker Golf Course Storage Tank
EU344	Vet. Med. Complex Tank (#2 Fuel Oil 1,000 gal.)
EU346	Black Eng. Bldg. Storage Tank #1 (#2 Fuel Oil 250 gal.)
EU347	Animal Resource Station Boilers (0.52 MMBtu/hr)
EU348	Agronomy and Ag. Eng. Research Center Boiler (Nat. Gas, 0.50 MMBtu/hr)
EU349	Agron. & Ag. Eng. Research Center Boiler (Nat. Gas <10MMBtu/hr)
EU350	Agronomy and Ag. Eng. Research Center Boiler (Nat. Gas, <10 MMBtu/hr)
EU354	Design College Printing Room
EU356	Design College Dryer
EU357	Design College Dryer
EU358	Black Eng Ceramic Heater
EU362	Applied Science 1 Emergency Generator (#2 Fuel Oil 13.5 gph)
EU363	Applied Science 1 Emergency Generator (#2 Fuel Oil 11.5 gph)
EU364	Design College Dye Cooker
EU366	Design College Emergency Generator (#2 Fuel Oil 13.5 gph)
EU369	Town Eng. Portable Sand Blaster
EU370	Town Eng Welding/Grinding/Etc
EU373	Administrative Services Emergency Generator (#2 Fuel Oil 3.35 gph)
EU374	Olsen Bldg.Emergency Gen.
EU375	Davidson Hall Engine Lab.
EU378	LIDIF Boiler (Nat. Gas, 2.7 MMBtu)
EU379	LIDIF Boiler (Nat. Gas, 2.7 MMBtu)
EU380	Industrial Education 1 Paint Spray Booth
EU 382	Design College Room 396 Paint Spray Room -Aerosol Can Use Only
EU 383	Design College Room 205 Paint Spray Room -Aerosol Can Use Only
EU384	Design College Glazing Spray Booth
EU385	Vet. Med Complex-Above Ground Storage Tank
EU386	Vet. Med Complex-Above Ground Storage Tank
EU387	Applied Science Center 1 Storage Tank
EU389	Wallace-Wilson Commons W-Underground Storage Tank
EU390	Design College Metal Smithing
EU392	LIDIF Boiler
EU 403	Armory Room 60 Paint Spray Room -Aerosol Can Use Only
EU 405	Vet. Med. Room 1218L Paint Spray Room -Aerosol Can Use Only
EU 406	Vet. Med. Room 1218M Paint Spray Room -Aerosol Can Use Only
EU407	Gilman Hall Emergency Generator-(Nat. Gas 45 kw)
EU409	Horticulture Emergency Generator- (Nat. Gas 104 kw)
EU410	Olsen Building Emergency Generator-(Nat. Gas 15 kw)
EU411	Eaton Hall Emergency Generator-(#2 Fuel Oil 125 kw)



## II. Plant-Wide Conditions

Facility Name: Iowa State University (Central Campus)

Permit Number: 04-TV-014

Permit conditions are established in accord with 567 Iowa Administrative Code rule 22.108

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### Permit Duration

The term of this permit is: Five Years

Commencing on: August 9, 2004

Ending on: August 8, 2009

Amendments, modifications and reopenings of the permit shall be obtained in accordance with 567 Iowa Administrative Code rules 22.110 - 22.114. Permits may be suspended, terminated, or revoked as specified in 567 Iowa Administrative Code Rules 22.115.

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### Emission Limits

*Unless specified otherwise in the Source Specific Conditions, the following limitations and supporting regulations apply to all emission points at this plant:*

Opacity (visible emissions): 40% opacity

Authority for Requirement: 567 IAC 23.3(2)"d"

Sulfur Dioxide (SO<sub>2</sub>): 500 parts per million by volume

Authority for Requirement: 567 IAC 23.3(3)"e"

Particulate Matter (state enforceable only)<sup>1</sup>:

No person shall cause or allow the emission of particulate matter from any source in excess of the emission standards specified in this chapter, except as provided in 567 – Chapter 24. For sources constructed, modified or reconstructed after July 21, 1999, the emission of particulate matter from any process shall not exceed an emission standard of 0.1 grain per dry standard cubic foot of exhaust gas, except as provided in 567 – 21.2(455B), 23.1(455B), 23.4(455B) and 567 – Chapter 24.

For sources constructed, modified or reconstructed prior to July 21, 1999, the emission of particulate matter from any process shall not exceed the amount determined from Table I, or amount specified in a permit if based on an emission standard of 0.1 grain per standard cubic foot of exhaust gas or established from standards provided in 23.1(455B) and 23.4(455B).

Authority for Requirement: 567 IAC 23.3(2)"a" (as revised 7/21/1999)

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<sup>1</sup> Pending approval into Iowa's State Implementation Plan (SIP), paragraph 567 IAC 23.3(2)"a" (as revised 7/21/1999) is considered state enforceable only.

### Particulate Matter<sup>2</sup>:

The emission of particulate matter from any process shall not exceed the amount determined from Table I, except as provided in 567 — 21.2(455B), 23.1(455B), 23.4(455B) and 567 — Chapter 24. If the director determines that a process complying with the emission rates specified in Table I is causing or will cause air pollution in a specific area of the state, an emission standard of 0.1 grain per standard cubic foot of exhaust gas may be imposed.

Authority for Requirement: 567 IAC 23.3(2)"a" (prior to 7/21/1999)

**Fugitive Dust:** Attainment and Unclassified Areas - No person shall allow, cause or permit any materials to be handled, transported or stored; or a building, its appurtenances or a construction haul road to be used, constructed, altered repaired or demolished, with the exception of farming operations or dust generated by ordinary travel on unpaved public roads, without taking reasonable precautions to prevent particulate matter in quantities sufficient to create a nuisance, as defined in Iowa Code section 657.1, from becoming airborne. All persons, with the above exceptions, shall take reasonable precautions to prevent the discharge of visible emissions of fugitive dusts beyond the lot line of the property on which the emissions originate. The highway authority shall be responsible for taking corrective action in those cases where said authority has received complaints of or has actual knowledge of dust conditions which require abatement pursuant to this subrule. Reasonable precautions may include, but not limited to, the following procedures.

1. Use, where practical, of water or chemicals for control of dusts in the demolition of existing buildings or structures, construction operations, the grading of roads or the clearing of land.
2. Application of suitable materials, such as but not limited to asphalt, oil, water or chemicals on unpaved roads, material stockpiles, race tracks and other surfaces which can give rise to airborne dusts.
3. Installation and use of containment or control equipment, to enclose or otherwise limit the emissions resulting from the handling and transfer of dusty materials, such as but not limited to grain, fertilizers or limestone.
4. Covering at all times when in motion, open-bodied vehicles transporting materials likely to give rise to airborne dusts.
5. Prompt removal of earth or other material from paved streets or to which earth or other material has been transported by trucking or earth-moving equipment, erosion by water or other means.

Authority for Requirement: 567 IAC 23.3(2)"c"

### **Relationship to Iowa State University Power Plant**

The Iowa State University Central Campus and Power Plant have been issued separate Title V Permits, but are considered as one stationary source for Title V and PSD applicability purposes.

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<sup>2</sup> Paragraph 567 IAC 23.3(2)"a" (prior to 7/21/1999) is the general particulate matter standard currently in the Iowa SIP.

### III. Emission Point-Specific Conditions

Facility Name: Iowa State University (Central Campus)  
Permit Number: **04-TV-014**

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#### Emission Point ID Numbers: See Table: Natural Gas-Fired Generators

##### Associated Equipment

Associated Emission Unit ID Number: See Table: Natural Gas Fired Generators

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Table: Natural Gas Fired Generators

Emission Point Number	Associated Emission Unit Number	Emission Unit Description	Raw Material/Fuel	Rated Capacity (MMBtu/hr)
EP203	EU203	Agronomy Hall Emergency Generator	Natural Gas	4.5
EP204	EU204	Black Engineering Building Emergency Generator	Natural Gas	6.06
EP205	EU205	Molecular Biology Emergency Generator	Natural Gas	7.38
EP208	EU208	Sweeny Hall Emergency Generator	Natural Gas	3.12

#### Applicable Requirements

##### Emission Limits (lb/hr, gr/dscf, lb/MMBtu, % opacity, etc.)

*The emissions from these emission points shall not exceed the following specified levels.*

Table: Natural Gas Fired Generators-Emission Limits

Emission Point Number	Associated Emission Unit Number	Opacity Limit	PM Limit (gr./dscf)	PM <sub>10</sub> Limit (lb./hr)	SO <sub>2</sub> Limit (ppmv)	NO <sub>x</sub> Limit (lb./hr)	Construction Permit No.
EP203	EU203	40% <sup>(1)</sup>	0.1	0.10	500	10.29	04-A-278
EP204	EU204	40% <sup>(1)</sup>	0.1	0.18	500	13.76	04-A-279
EP205	EU205	40% <sup>(1)</sup>	0.1	0.20	500	16.75	04-A-280
EP208	EU208	40% <sup>(1)</sup>	0.1	0.10	500	7.08	04-A-281

<sup>(1)</sup> Per DNR Air Quality Policy 3-b-08, Opacity Limits, an exceedance of the indicator opacity of (25%) will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. The permit holder shall also file an “indicator opacity exceedance report” with the

DNR field office and keep records as required in the policy. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing).

Pollutant: Opacity

Emission Limit(s): 40%

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Natural Gas-Fired Generators  
567 IAC 23.3(2)"d"

Pollutant: Particulate Matter (PM)

Emission Limit(s): 0.1 gr./scf

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Natural Gas Fired Generators-Emission Limits  
567 IAC 23.3(2)"a"

Pollutant: PM<sub>10</sub>

Emission Limits: See Table: Natural Gas-Fired Generators

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Natural Gas Fired Generators-Emission Limits

Pollutant: Sulfur Dioxide (SO<sub>2</sub>)

Emission Limit(s): 500 ppmv

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Natural Gas Fired Generators-Emission Limits  
567 IAC 23.3(3)"e"

Pollutant: Nitrogen Oxides (NO<sub>x</sub>)

Emission Limit(s): See Table: Natural Gas-Fired Generators

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Natural Gas Fired Generators-Emission Limits

### **Operational Limits & Requirements**

*The owner/operator of this equipment shall comply with the operational limits and requirements listed below.*

Table: Natural Gas-Fired Generators-Operational Limits & Requirements

Emission Point Number	Associated Emission Unit Number	Fuel	12-Month Rolling Total Usage Limit	Authority for Requirements (IDNR Construction Permit No.)
EP203	EU203	Natural Gas Only	2.27 MMcf	04-A-278
EP204	EU204		3.03 MMcf	04-A-279
EP205	EU205		3.69 MMcf	04-A-280
EP208	EU208		1.56 MMcf	04-A-281

**Reporting & Record keeping:**

All records as required by this permit shall be kept on-site for a minimum of five (5) years and shall be available for inspection by the DNR. Records shall be legible and maintained in an orderly manner. The records shall show the following for each of the above generators:

- A. The monthly quantity (in Cubic Feet) of natural gas utilized.
- B. Annual fuel usage determined on a 12-month rolling basis, for each month of operation.

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Natural Gas Fired Generators-Operational Limits & Requirements

**Emission Point Characteristics**

*These emission points shall conform to the conditions specified in Table: Natural Gas Fired Generators-Emission Point Characteristics*

Table: Natural Gas Fired Generators-Emission Point Characteristics

Emission Point Number	Emission Unit Number	Authority for Requirement (Construction Permit Number)	Stack Characteristics				
			Height (ft.) From Ground	Diameter (inches)	Exhaust Flowrate (scfm)	Exhaust Temp. (°F)	Discharge Style
EP203	EU203	04-A-278	43	8	809	1110	Vertical, Unobstructed
EP204	EU204	04-A-279	-4.5	6	1152	1110	Horizontal
EP205	EU205	04-A-280	66ft. 2in.	10	1547	1150	Vertical, Unobstructed
EP208	EU208	04-A-281	50	8	790	1110	Horizontal

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flowrate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

**Periodic Monitoring Requirements**

*The owner/operator of this equipment shall comply with the periodic monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required? Yes ☐ No ☒**

**Facility Maintained Operation & Maintenance Plan Required? Yes ☐ No ☒**

Authority for Requirement: 567 IAC 22.108(3)"b"

## Emission Point ID Numbers: See Table: Diesel Fired Generators

### Associated Equipment

Associated Emission Unit ID Number: See Table: Diesel Fired Generators

Table: Diesel-Fired Generators

Emission Point Number	Associated Emission Unit Number	Emission Unit Description	Raw Material/Fuel	Rated Capacity (gal./hr)
EP217	EU217	Veterinary Medicine Emergency Generator	No. 1 or No. 2 Fuel Oil	25.3
EP246	EU246	Intensive Livestock Research and Instruction Facilities Emergency Generator	No. 2 Fuel Oil	26.60
EP337	EU337	Howe Hall Emergency Generator	No. 2 Fuel Oil	50.10
EP338	EU338	Maple Hall Emergency Generator	No. 2 Fuel Oil	35.2
EP352	EU352	Livestock Infectious Disease Isolation Facility Emergency Generator	No. 2 Fuel Oil	22.70

## Applicable Requirements

### Emission Limits (lb/hr, gr/dscf, lb/MMBtu, % opacity, etc.)

*The emissions from these emission points shall not exceed the following specified levels.*

Table: Diesel Fired Generators-Emission Limits

Emission Point Number	Associated Emission Unit Number	Opacity Limit	PM Limit		PM <sub>10</sub> Limit (lb./hr)	SO <sub>2</sub> Limit		
			TPY	Lb./MMBtu		Lb./hr	TPY	Lb./MMBtu
EP217	EU217	40% <sup>(1)</sup>	N/A	0.6	1.25	1.81	N/A	2.5
EP246	EU246	40% <sup>(1)</sup>	N/A	0.6	3.29	N/A	N/A	2.5
EP337	EU337	40% <sup>(2)</sup>	N/A	0.6	2.0	0.71	N/A	2.5
EP338	EU338	40% <sup>(2)</sup>	N/A	0.6	0.69	N/A	N/A	0.6
EP352	EU352	40%	0.25	0.6	1.00	0.93	0.08	2.5

<sup>(1)</sup> Per DNR Air Quality Policy 3-b-08, Opacity Limits, an exceedance of the indicator opacity of (25%) will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. The permit holder shall also file an “indicator opacity exceedance report” with the DNR field office and keep records as required in the policy. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing).

<sup>(2)</sup> If visible emissions exceed the indicator opacity (25%) other than start-up, shut-down, or malfunction, a stack test may be required to demonstrate compliance with the particulate standard.

Table: Diesel Fired Generators-Emission Limits (Cont.)

Emission Point Number	Associated Emission Unit Number	NO <sub>x</sub> Limit		CO Limit		Construction Permit No.
		Lb./hr	TPY	Lb./hr	TPY	
EP217	EU217	14.35	N/A	N/A	N/A	04-A-285
EP246	EU246	25.0	N/A	N/A	N/A	98-A-458-S1
EP337	EU337	22.44	N/A	6.0	N/A	99-A-316
EP338	EU338	N/A	N/A	N/A	N/A	99-A-324
EP352	EU352	14.20	3.55	3.06	0.76	98-A-1086

Pollutant: Opacity

Emission Limit(s): See Table: Diesel Fired Generators-Emission Limits

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Diesel  
-Fired Generators-Emission Limits  
567 IAC 23.3(2)"d"

Pollutant: Particulate Matter (PM)

Emission Limit(s): See Table: Diesel Fired Generators-Emission Limits

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Diesel  
-Fired Generators-Emission Limits  
567 IAC 23.3(2)"b"

Pollutant: Sulfur Dioxide (SO<sub>2</sub>)

Emission Limit(s): See Table: Diesel Fired Generators-Emission Limits

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Diesel  
-Fired Generators-Emission Limits  
567 IAC 23.3(3)"b"

Pollutant: Nitrogen Oxides (NO<sub>x</sub>)

Emission Limit(s): See Table: Diesel Fired Generators-Emission Limits

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Diesel  
-Fired Generators-Emission Limits

Pollutant: Carbon Monoxide (CO)

Emission Limit(s): See Table: Diesel Fired Generators-Emission Limits

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Diesel  
-Fired Generators-Emission Limits

### **Operational Limits & Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below.

Table: Diesel Fired Generators-Operational Limits & Requirements

<b>Emission Point Number</b>	<b>Associated Emission Unit Number</b>	<b>Allowable Fuel</b>	<b>Maximum Fuel Sulfur Content</b>	<b>12-Month Rolling Total Usage Limit</b>	<b>Authority for Requirements (IDNR Construction Permit No.)</b>
EP217	EU217	#1 or #2 Distillate	0.5 % by weight	1,000 hours	04-A-285
EP246	EU246	#1 or #2 Distillate	0.5 % by weight	500 hours	98-A-458-S1
EP337	EU337	#2 Distillate	0.1 % by weight	500 hours	99-A-316
EP338	EU338	#2 Distillate	0.1 % by weight	500 hours	99-A-324
EP352	EU352	#2 Distillate	0.1% by weight	500 hours	98-A-1086

#### **Reporting & Record keeping:**

All records as required by this permit shall be kept on-site for a minimum of five (5) years and shall be available for inspection by the DNR. Records shall be legible and maintained in an orderly manner. The records shall show the following for each of the above generators:

- A. Record the type of fuel used and the sulfur content of the fuel (by weight percent).
- B. Record the monthly usage of the generator (in hours).
- C. Annual generator usage shall be determined on a 12-month rolling basis, for each month of operation.

Authority for Requirement: Iowa DNR Construction Permits specified in Table: Diesel Fired Generators-Operational Limits & Requirements

Additional requirements for EU/EP217 only: The exhaust stack shall be increased from 20.5 feet to 30 feet above ground and made vertical unobstructed by September 5, 2004.

Authority for Requirement: Iowa DNR Construction Permit 04-A-285



**Emission Point Characteristics**

*These emission points shall conform to the conditions specified in Table: Diesel Fired Generators-Emission Point Characteristics*

Table: Diesel Fired Generators-Emission Point Characteristics

Emission Point Number	Emission Unit Number	Authority for Requirement (Construction Permit Number)	Stack Characteristics				
			Height (ft.) From Ground	Diameter	Exhaust Flowrate	Exhaust Temp. (°F)	Discharge Style
EP217	EU217	04-A-285	30	5 in.	1455 scfm	855	Vertical, Unobstructed
EP246	EU246	98-A-458-S1	35.5	8 in.	1468 scfm	695	Vertical, Obstructed
EP337	EU337	99-A-316	84	12 in.	5414 acfm	1024	Vertical, Unobstructed
EP338	EU338	99-A-324	14.1	1 ft.	3945 acfm	939	N/A
EP352	EU352	98-A-1086	36	5 in.	2452 acfm	1002	Vertical, Unobstructed

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flowrate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

**Periodic Monitoring Requirements**

*The owner/operator of this equipment shall comply with the periodic monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required? Yes ☐ No ☒**

**Facility Maintained Operation & Maintenance Plan Required? Yes ☐ No ☒**

Authority for Requirement: 567 IAC 22.108(3)"b"

## Emission Point ID Numbers: See Table: Permitted Boilers

### Associated Equipment

Associated Emission Unit ID Number: See Table: Permitted Boilers

Table: Permitted Boilers

Emission Point Number	Associated Emission Unit Number	Emission Unit Description	Raw Material/Fuel	Rated Capacity (MMBtu/hr)
EP210	EU210a	Wallace-Wilson Boiler #1	Fuel Oil	16.74
	EU210		Natural Gas	
	EU211a	Wallace-Wilson Boiler #2	Fuel Oil	16.74
	EU211		Natural Gas	
EP212	EU212	Veterinary Medicine Boiler #3	Natural Gas	37.02
EP213	EU213	Veterinary Medicine Boiler #1	Natural Gas	37.02

## Applicable Requirements

### Emission Limits (lb/hr, gr/dscf, lb/MMBtu, % opacity, etc.)

*The emissions from these emission points shall not exceed the following specified levels.*

Table: Permitted Boilers-Emission Limits

Emission Point Number	Associated Emission Unit Number	Opacity Limit	PM Limit		PM <sub>10</sub> Limit (lb./hr)	SO <sub>2</sub> Limit		NO <sub>x</sub> Limit (lb./hr)	Construction Permit No.
			Lb/hr	Lb/MMBtu					
EP210	EU210a	40% <sup>(1)</sup>	0.70	0.6	0.70	17.04 lb/hr	2.5 lb/MMBtu	4.12	04-A-282
	EU210						500 ppmv		
	EU211a						2.5 lb/MMBtu		
	EU211						500 ppmv		
EP212	EU212	40% <sup>(1)</sup>	0.70	0.6	0.70	500 ppmv	3.70	04-A-283	
EP213	EU213	40% <sup>(1)</sup>	0.70	0.6	0.70	500 ppmv	3.70	04-A-284	

<sup>(1)</sup> Per DNR Air Quality Policy 3-b-08, Opacity Limits, an exceedance of the indicator opacity of (25%) will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. The permit holder shall also file an “indicator opacity exceedance report” with the DNR field office and keep records as required in the policy. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing).

Pollutant: Opacity  
Emission Limit(s): 40%  
Authority for Requirement: Iowa DNR Construction Permits specified in Table:  
Permitted Boilers-Emission Limits  
567 IAC 23.3(2)"d"

Pollutant: Particulate Matter (PM)  
Emission Limits: 0.70 lb./hr  
Authority for Requirement: Iowa DNR Construction Permits specified in Table:  
Permitted Boilers-Emission Limits

Pollutant: Particulate Matter (PM)  
Emission Limits: 0.6 lb./MMBtu  
Authority for Requirement: Iowa DNR Construction Permits specified in Table:  
Permitted Boilers-Emission Limits  
567 IAC 23.3(2)"b"

Pollutant: PM<sub>10</sub>  
Emission Limits: See Table: Permitted Boilers-Emission Limits  
Authority for Requirement: Iowa DNR Construction Permits specified in Table:  
Permitted Boilers-Emission Limits

Pollutant: Sulfur Dioxide (SO<sub>2</sub>)  
Emission Limit(s): 2.5 lb/MMBtu (when combusting fuel oil)  
Authority for Requirement: 567 IAC 23.3(3)"b"(2)

Pollutant: Sulfur Dioxide (SO<sub>2</sub>)  
Emission Limit(s): 500 ppmv (when combusting natural gas)  
Authority for Requirement: Iowa DNR Construction Permits 04-A-283 and 04-A-284  
567 IAC 23.3(3)"e"

Pollutant: Sulfur Dioxide (SO<sub>2</sub>)  
Emission Limit(s): (lb/hr) As specified in Table: Boilers-Emission Limits  
Authority for Requirement: Iowa DNR Construction Permits specified in Table: Boilers-Emission Limits

Pollutant: Nitrogen Oxides (NO<sub>x</sub>)  
Emission Limit(s): See Table: Permitted Boilers-Emission Limits  
Authority for Requirement: Iowa DNR Construction Permits specified in Table:  
Permitted Boilers-Emission Limits

### **Operational Limits & Requirements**

*The owner/operator of this equipment shall comply with the operational limits and requirements listed below.*

Table: Permitted Boilers-Operational Limits & Requirements

Emission Point Number	Associated Emission Unit Number	Allowed Fuel	12-Month Rolling Total Usage Limit	Maximum Fuel Sulfur Content	Authority for Requirements (IDNR Construction Permit No.)
EP210	EU210a	Natural Gas, Fuel Oil #1 and Fuel Oil #2	1,080,000 gal Fuel Oil	0.5% (by wt.)	04-A-282
	EU210				
	EU211a				
	EU211				
EP212	EU212	Natural Gas	N/A	N/A	04-A-283
EP213	EU213	Natural Gas	N/A	N/A	04-A-284

For EP210 only, the exhaust stack height must be increased from 34.7 feet to 45 feet and made vertical unobstructed by September 5, 2004

Authority for Requirement: Iowa DNR Construction Permit 04-A-282

Reporting & Record keeping: The following recordkeeping is required for EU210 and 211 only. All records as required by this permit shall be kept on-site for the lifetime of the equipment and shall be available for inspection by the DNR. Records shall be legible and maintained in an orderly manner.

- A. Record the type of fuel used and the sulfur content of the fuel.
- B. Record the monthly quantity (in gallons) of fuel oil utilized in each boiler.
- C. Annual fuel usage shall be determined on a 12-month rolling basis for each month of operation.

Authority for Requirement: Iowa DNR Construction Permit 04-A-282

### **Emission Point Characteristics**

*These emission points shall conform to the conditions specified in Table: Permitted Boilers-Emission Point Characteristics*

Table: Permitted Boilers-Emission Point Characteristics

Emission Point Number	Emission Unit Number	Authority for Requirement (Construction Permit Number)	Stack Characteristics				Discharge Style
			Height (ft.) From Ground	Diameter (inches)	Exhaust Flowrate (scfm)	Exhaust Temp. (°F)	
EP210	EU210a	04-A-282	45	29.5	1162	297	Vertical, Unobstructed
	EU210						
	EU211a						
	EU211						

Table: Permitted Boilers-Emission Point Characteristics (Cont.)

Emission Point Number	Emission Unit Number	Authority for Requirement (Construction Permit Number)	Stack Characteristics				
			Height (ft.) From Ground	Diameter (inches)	Exhaust Flowrate (scfm)	Exhaust Temp. (°F)	Discharge Style
EP212	EU212	04-A-283	48	28.4	7478	485	Vertical, Unobstructed
EP213	EU213	04-A-284	48	28.4	7478	485	Vertical, Unobstructed

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flowrate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

#### **Periodic Monitoring Requirements**

*The owner/operator of this equipment shall comply with the periodic monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required? Yes ☐ No ☒**

**Facility Maintained Operation & Maintenance Plan Required? Yes ☐ No ☒**

Authority for Requirement: 567 IAC 22.108(3)"b"

## Emission Point ID Numbers: See Table: Grandfathered Boilers

### Associated Equipment

Associated Emission Unit ID Numbers: See Table: Grandfathered Boilers

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Table: Grandfathered Boilers

Emission Point Number	Associated Emission Unit Number	Emission Unit Description	Raw Material/Fuel	Rated Capacity (MMBtu/hr)
EP333	EU333a	Applied Science 1-Boiler #1	Fuel Oil #2	5.5
	EU333		Natural Gas	
EP334	EU334a	Applied Science 1-Boiler #2	Fuel Oil #2	5.5
	EU334		Natural Gas	
EP335	EU335a	Knapp-Storms-Boiler #1	Fuel Oil #2	6.9
	EU335		Natural Gas	
	EU336a	Knapp-Storms-Boiler #2	Fuel Oil #2	6.9
	EU336		Natural Gas	

### Applicable Requirements

#### Emission Limits (lb/hr, gr/dscf, lb/MMBtu, % opacity, etc.)

*The emissions from these emission points shall not exceed the following specified levels.*

Pollutant: Opacity

Emission Limit(s): 40%

Authority for Requirement: 567 IAC 23.3(2)"d"

Pollutant: Particulate Matter (PM)

Emission Limit(s): 0.6 lb./MMBtu

Authority for Requirement: 567 IAC 23.3(2)"b"(3)

Pollutant: Sulfur Dioxide (SO<sub>2</sub>)

Emission Limit(s): 2.5 lb./MMBtu (when burning fuel oil)

Authority for Requirement: 567 IAC 23.3(3)"b"

Pollutant: Sulfur Dioxide (SO<sub>2</sub>)

Emission Limit(s): 500 ppmv (when burning natural gas)

Authority for Requirement: 567 IAC 23.3(3)"e"

**Operational Limits & Requirements**

*The owner/operator of this equipment shall comply with the operational limits and requirements listed below.*

Process throughput:

- A. No person shall allow, cause or permit the combustion of number 1 or number 2 fuel oil exceeding a sulfur content of 0.5 percent by weight.

Authority for Requirement: 567 IAC 23.3(3)"b"(1)

Reporting & Record keeping:

The following records shall be maintained on-site for five (5) years and available for inspection upon request by representatives of the Department of Natural Resources:

- A. The facility shall monitor the percent of sulfur by weight in the fuel oil as delivered. The documentation may be vendor supplied or facility generated.

Authority for Requirement: 567 IAC 22.108(3)

**Periodic Monitoring Requirements**

*The owner/operator of this equipment shall comply with the periodic monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required? Yes ☐ No ☒**

**Facility Maintained Operation & Maintenance Plan Required? Yes ☐ No ☒**

Authority for Requirement: 567 IAC 22.108(3)"b"

## Emission Point ID Numbers: See Table: Paint Spray Booths

### Associated Equipment

Associated Emission Unit ID Number: See Table: Paint Spray Booths

Emissions Control Equipment ID Numbers: See Table: Paint Spray Booths

Emissions Control Equipment: See Table: Paint Spray Booths

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Table: Paint Spray Booths

Emission Point Number	Associated Emission Unit Number	Emission Unit Description	Raw Material/Fuel	Control Equipment Number	Control Equipment Description	Raw Material/Fuel	Rated Capacity (gal./hr)
EP220	EU220	General Services Paint Spray Booth	Paint	CE220	Aerosol Filter	Paint	3.75?
EP339	EU339	Howe Hall Paint Spray Booth	Paint	<b>Need CE-01</b>	Fabric Filter	Paint	<b>Need Info</b>

### Applicable Requirements

#### Emission Limits (lb/hr, gr/dscf, lb/MMBtu, % opacity, etc.)

*The emissions from these emission points shall not exceed the following specified levels.*

Pollutant: Opacity

Emission Limit(s): 40%<sup>(1)</sup>

Authority for Requirement: Iowa DNR Construction Permits 04-A-286 (EP220) and 00-A-659 (EP339)  
567 IAC 23.3(2)"d"

<sup>(1)</sup> Per DNR Air Quality Policy 3-b-08, Opacity Limits, an exceedance of the indicator opacity of (25%) will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. The permit holder shall also file an "indicator opacity exceedance report" with the DNR field office and keep records as required in the policy. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing).

Pollutant: Particulate Matter (PM)

Emission Limit(s): 0.01 gr./scf

Authority for Requirement: Iowa DNR Construction Permits 04-A-286 (EP220) and 00-A-659 (EP339)  
567 IAC 23.4(13)



Pollutant: PM<sub>10</sub>

Emission Limits: 1.11 lb./hr (for EU220)

Authority for Requirement: Iowa DNR Construction Permit 04-A-286

Pollutant: PM<sub>10</sub>

Emission Limits: 0.10 lb./hr (for EU339)

Authority for Requirement: Iowa DNR Construction Permit 00-A-659

### **Operational Limits & Requirements**

*The owner/operator of this equipment shall comply with the operational limits and requirements listed below.*

Table: Paint Spray Booths-Operational Limits & Requirements

<b>Emission Point Number</b>	<b>Associated Emission Unit Number</b>	<b>Spray Guns</b>	<b>VOC Limit of Materials Used</b>	<b>HAP Limit of Materials Used</b>	<b>12-Month Rolling Total Paint &amp; Cleaning Material Usage Limit</b>	<b>Authority for Requirements (IDNR Construction Permit No.)</b>
EP220	EU220	Max. spray gun rate of 3.75 gal./hr	12.0 lb./gal	5.0 lb./gal	500 gal.	04-A-286
EP339	EU339	Only one spray gun may be used at any one time	8.4 lb./gal	6.8 lb./gal	500 gal.	00-A-659

For EP220 only, the exhaust stack height must be made vertical unobstructed by September 5, 2004.

Authority for Requirement: Iowa DNR Construction Permit 04-A-286

Reporting & Record keeping: All records as required by this permit shall be kept on-site for a minimum of five (5) years and shall be available for inspection by the DNR. Records shall be legible and maintained in an orderly manner.

- A. The MSDS of each painting and cleaning material used at the facility shall be kept on-site and available for inspection by the DNR.
- B. Record the VOC and HAPs content in lbs./gal of each material used in the booths.
- C. Record the monthly material usage, in gallons, of each material used in each booth and calculate the quantity of material, in gallons, used on a 12-month rolling basis for each month of operation.

Authority for Requirement: Iowa DNR Construction Permits 04-A-286 (EP220) and 00-A-659 (EP339)

### **Emission Point Characteristics**

*These emission points shall conform to the conditions specified in Table: Paint Spray Booths-Emission Point Characteristics*

Table: Paint Spray Booths-Emission Point Characteristics

Emission Point Number	Emission Unit Number	Authority for Requirement (Construction Permit Number)	Stack Characteristics				
			Height (ft.) From Ground	Diameter (inches)	Exhaust Flowrate (scfm)	Exhaust Temp. (°F)	Discharge Style
EP220	EU220	04-A-286	24	30	13,000	Ambient	Vertical, Obstructed
EP339	EU339	00-A-659	84	18	3,850	Ambient	Vertical, Unobstructed

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flowrate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

### **Periodic Monitoring Requirements**

*The owner/operator of this equipment shall comply with the periodic monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required?** Yes ☒ No ☐

**Facility Maintained Operation & Maintenance Plan Required?** Yes ☐ No ☒

Authority for Requirement: 567 IAC 22.108(3)"b"

## **Spray Booth Filter Agency Operation & Maintenance Plan**

### **Weekly**

- Inspect the spray booth system for conditions that reduce the operating efficiency of the collection system. This will include a visual inspection of the condition of the filter material.
- Maintain a written record of the observation and any action resulting from the inspection.

### **Record Keeping and Reporting**

Maintenance and inspection records will be kept for five years and available upon request.

**Quality Control**

- The filter equipment will be operated and maintained according to the manufacturers recommendations.

## **Emission Point ID Numbers: See Table: Smokehouses**

### Associated Equipment

Associated Emission Unit ID Number: See Table: Smokehouses

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Table: Smokehouses

<b>Emission Point Number</b>	<b>Associated Emission Unit Number</b>	<b>Emission Unit Description</b>	<b>Raw Material/Fuel</b>	<b>Rated Capacity (lb/hr)</b>
EP236	EU236	Meats Lab-Smokehouse #1	Wood	62.5
EP237	EU237	Meats Lab-Smokehouse #2	Wood	62.5

### **Applicable Requirements**

#### **Emission Limits (lb/hr, gr/dscf, lb/MMBtu, % opacity, etc.)**

*The emissions from these emission points shall not exceed the following specified levels.*

Pollutant: Opacity

Emission Limit(s): 40%<sup>(1)</sup>

Authority for Requirement: Iowa DNR Construction Permits 04-A-289 (EP236) and  
04-A-290(EP237)  
567 IAC 23.3(2)"d"

<sup>(1)</sup> Per DNR Air Quality Policy 3-b-08, Opacity Limits, an exceedance of the indicator opacity of (25%) will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. The permit holder shall also file an "indicator opacity exceedance report" with the DNR field office and keep records as required in the policy. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing).

Pollutant: Particulate Matter (PM)

Emission Limit(s): 0.2 gr./scf

Authority for Requirement: Iowa DNR Construction Permits 04-A-289 (EP236) and  
04-A-290 (EP237)  
567 IAC 23.4(9)

Pollutant: PM<sub>10</sub>

Emission Limits: 1.23 lb./hr (for EU236)

Authority for Requirement: Iowa DNR Construction Permit 04-A-289

Pollutant: PM<sub>10</sub>

Emission Limits: 1.31 lb./hr (for EU237)

Authority for Requirement: Iowa DNR Construction Permit 04-A-290

### **Emission Point Characteristics**

*These emission points shall conform to the conditions specified in Table: Smokehouses-Emission Point Characteristics*

Table: Smokehouses-Emission Point Characteristics

Emission Point Number	Emission Unit Number	Authority for Requirement (Construction Permit Number)	Stack Characteristics				
			Height (ft.) From Ground	Diameter (inches)	Exhaust Flowrate (scfm)	Exhaust Temp. (°F)	Discharge Style
EP236	EU236	04-A-289	41	7	720	129	Vertical, Obstructed
EP237	EU237	04-A-290	46	10	765	129	Vertical, Unobstructed

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flowrate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

### **Periodic Monitoring Requirements**

*The owner/operator of this equipment shall comply with the periodic monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required? Yes ☐ No ☒**

**Facility Maintained Operation & Maintenance Plan Required? Yes ☐ No ☒**

Authority for Requirement: 567 IAC 22.108(3)"b"

## Emission Point ID Numbers: See Table: Woodworking Shop

### Associated Equipment

Associated Emission Unit ID Number: See Table: Woodworking Shop

Emissions Control Equipment ID Number: See Table: Woodworking Shop

Emissions Control Equipment Description: See Table: Woodworking Shop

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Table: Woodworking Shop

Emission Point Number	Associated Emission Unit Number	Emission Unit Description	Raw Material/Fuel	Control Equipment Number	Control Equipment Description	Rated Capacity
EP230	EU230	Woodworking	Wood	CE230	Cyclone	N/A
EP230a	EU230a	Dust Collection Dumpster	Wood	CE230	Cyclone	N/A

### Applicable Requirements

#### Emission Limits (lb/hr, gr/dscf, lb/MMBtu, % opacity, etc.)

*The emissions from these emission points shall not exceed the following specified levels.*

Pollutant: Opacity

Emission Limit(s): 40%<sup>(1)</sup>

Authority for Requirement: Iowa DNR Construction Permits 04-A-287 (EP230) and  
04-A-288 (EP230a)  
567 IAC 23.3(2)"d"

<sup>(1)</sup> Per DNR Air Quality Policy 3-b-08, Opacity Limits, an exceedance of the indicator opacity of (25%) will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. The permit holder shall also file an "indicator opacity exceedance report" with the DNR field office and keep records as required in the policy. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing).

Pollutant: Particulate Matter (PM)

Emission Limit(s): 0.1 gr./scf

Authority for Requirement: Iowa DNR Construction Permits 04-A-287 (EP230) and  
04-A-288 (EP230a)  
567 IAC 23.3(2)"a"

Pollutant: PM<sub>10</sub>  
 Emission Limits: 4.0 lb./hr (for EP230)  
 Authority for Requirement: Iowa DNR Construction Permit 04-A-287

Pollutant: PM<sub>10</sub>  
 Emission Limits: 0.01 lb./hr (for EP230a)  
 Authority for Requirement: Iowa DNR Construction Permit 04-A-288

### **Operational Limits & Requirements**

*The owner/operator of this equipment shall comply with the operational limits and requirements listed below.*

#### **The following apply only to EU230.**

Hours of operation:

- A. The woodworking shop cyclone shall only operate between the hours of 9:00 a.m. and 5:00 p.m.

Reporting & Record keeping: All records as required by this permit shall be kept on-site for a minimum of five (5) years and shall be available for inspection by the DNR. Records shall be legible and maintained in an orderly manner.

- A. The facility shall record the time and duration (in hours) of operation of this emission unit for each day of operation.

Additional requirements:

- A. The exhaust (EP230) shall be increased from 22 to 35 feet above ground and made vertical unobstructed by September 5, 2004.

Authority for Requirement: Iowa DNR Construction Permit 04-A-287

### **Emission Point Characteristics**

*These emission points shall conform to the conditions specified in Table: Woodworking Shop-Emission Point Characteristics*

Table: Woodworking Shop-Emission Point Characteristics

Emission Point Number	Emission Unit Number	Authority for Requirement (Construction Permit Number)	Stack Characteristics				
			Height (ft.) From Ground	Diameter (inches)	Exhaust Flowrate (scfm)	Exhaust Temp. (°F)	Discharge Style
EP230	EU230	04-A-287	35	44.5	9,000	Ambient	Vertical, Unobstructed
EP230a	EU230a	04-A-288	10.5	29 X 29	Displacement Flow	Ambient	Horizontal

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flowrate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

**Periodic Monitoring Requirements**

*The owner/operator of this equipment shall comply with the periodic monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required? Yes ☐ No ☒**

**Facility Maintained Operation & Maintenance Plan Required? Yes ☒ No ☐**

*Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.*

*Facility operation and maintenance plans are to be developed by the facility within six(6) months of the issuance date of this permit and the data pertaining to the plan maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.*

*Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.*

Authority for Requirement: 567 IAC 22.108(3)"b"



## **Emission Point ID Number: EP200**

### Associated Equipment

Associated Emission Unit ID Numbers: EU200  
Emissions Control Equipment ID Number: CE200  
Emissions Control Equipment Description: Afterburner

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Emission Unit vented through this Emission Point: EU200  
Emission Unit Description: Veterinary Medicine Incinerator  
Raw Material/Fuel: Pathological waste  
Rated Capacity: 1,080 lb./hr

### **Applicable Requirements**

#### **Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)**

*The emissions from this emission point shall not exceed the levels specified below.*

Pollutant: Opacity

Emission Limits: 40 %<sup>(1)(2)</sup>

Authority for Requirement: Iowa DNR Construction Permit 75-A-368-S3  
567 IAC 23.4(12)"b"

<sup>(1)</sup> Per DNR Air Quality Policy 3-b-08, Opacity Limits, an exceedence of the indicator opacity of 25% will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedence. The permit holder shall also file an "indicator opacity exceedence report" with the DNR field office and keep records as required in the policy. If exceedences continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing).

<sup>(2)</sup> Note that visible air contaminants in excess of 60% may be emitted for a period or period aggregating not more than 3 minutes in any 60-minute period during an operation breakdown or during the cleaning of air pollution control equipment.

Pollutant: Particulate Matter (PM)

Emission Limit(s): 0.2 gr./scf<sup>(3)</sup>

Authority for Requirement: Iowa DNR Construction Permit 75-A-368-S3  
567 IAC 23.4(12)"a"

<sup>(3)</sup> 0.2 grains per standard cubic foot adjusted to 12 percent carbon dioxide.

Pollutant: Sulfur Dioxide (SO<sub>2</sub>)

Emission Limit(s): 500 ppm

Authority for Requirement: Iowa DNR Construction Permit 75-A-368-S3  
567 IAC 23.3(3)"e"

### **Operational Limits & Requirements**

*The owner/operator of this equipment shall comply with the operational limits and requirements listed below.*

NSPS:

A. Per the exemption listed in 40 CFR 60.32e(c) and 567 IAC 23.1(5)"b"(2)3, this emission unit is not subject to the Emission Guidelines for Hospital/Medical/Infectious Waste Incinerators (Subpart Ce).

Process throughput:

- A. The emission unit's primary and secondary burners shall operate exclusively on natural gas, i.e. no backup fuel source.
- B. The afterburner shall operate at all times during any operation of the primary chamber.
- C. The incinerator is limited to combusting only 10 percent or less of the weight of which is combusted, in aggregate, of hospital waste and medicinal/infectious waste as measured on a calendar quarter basis as defined in 40 CFR 60.51c.

Control equipment parameters:

- A. The afterburner shall operate at all times during any operation of the primary chamber.

Reporting & Record keeping: All records as required by this permit shall be kept on-site for a minimum of five (5) years and shall be available for inspection by the DNR. These records shall demonstrate compliance with all applicable operating limits. Records shall be legible and maintained in an orderly manner.

- A. Record the amount of natural gas used on a rolling 12-month basis.
- B. Record the weight of hospital waste and medical/infectious waste combusted by the incinerator as measured on a rolling 12-month basis.
- C. Record the weight of all other fuels and waste combusted by the incinerator as measured on a rolling 12-month basis.

Authority for Requirement: Iowa DNR Construction Permit 75-A-368-S3

### **Emission Point Characteristics**

*The emission point shall conform to the specifications listed below.*

Stack Height, (ft, from the ground): 70

Stack Opening, (inches, dia.): 31

Exhaust Flow Rate (scfm): 4,600

Exhaust Temperature (°F): 1,800

Discharge Style: Vertical Unobstructed

Authority for Requirement: Iowa DNR Construction Permit 75-A-368-S3

The temperature and flow rate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the

emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

### **Monitoring Requirements**

*The owner/operator of this equipment shall comply with the monitoring requirements listed below.*

#### **Stack Testing:**

Pollutant – Particulate Matter (PM)

Stack Test to be Completed by (date) – Within two years of issuance of permit

Test Method – Iowa Compliance Sampling Manual Method 5

Authority for Requirement - 567 IAC 22.108(3)

**Agency Approved Operation & Maintenance Plan Required?** Yes ☐ No ☒

**Facility Maintained Operation & Maintenance Plan Required?** Yes ☒ No ☐

*Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.*

*Facility operation and maintenance plans are to be developed by the facility within six(6) months of the issuance date of this permit and the data pertaining to the plan maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.*

*Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.*

Authority for Requirement: 567 IAC 22.108(3)

## **Emission Point ID Number: EP235**

### Associated Equipment

Associated Emission Unit ID Numbers: EU235

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Emission Unit vented through this Emission Point: EU235

Emission Unit Description: Linear Accelerator

Raw Material/Fuel: N/A

Rated Capacity: N/A

### **Applicable Requirements**

#### **Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)**

*The emissions from this emission point shall not exceed the levels specified below.*

There are no emission limits at this time.

#### **Operational Limits & Requirements**

*The owner/operator of this equipment shall comply with the operational limits and requirements listed below.*

There are no operational limits at this time.

#### **Emission Point Characteristics**

*The emission point shall conform to the specifications listed below.*

Stack Height, (ft, from the ground): 48

Stack Opening, (inches, dia.): 36

Exhaust Flow Rate (scfm): 14,600

Exhaust Temperature (°F): Ambient

Discharge Style: Vertically Unobstructed

Authority for Requirement: Iowa DNR Construction Permit 03-A-1061

The temperature and flow rate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

**Monitoring Requirements**

*The owner/operator of this equipment shall comply with the monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required?**

Yes ☐ No ☒

**Facility Maintained Operation & Maintenance Plan Required?**

Yes ☐ No ☒

Authority for Requirement: 567 IAC 22.108(3)

## **Emission Point ID Number: EP244**

### Associated Equipment

Associated Emission Unit ID Numbers: EU243, EU244, EU245

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Emission Unit vented through this Emission Point: EU243

Emission Unit Description: Collection Cyclone

Raw Material/Fuel: Metal

Rated Capacity: 300 lb./day

Emission Unit vented through this Emission Point: EU244

Emission Unit Description: Metal Atomizer

Raw Material/Fuel: Metal

Rated Capacity: 300 lb./day

Emission Unit vented through this Emission Point: EU245

Emission Unit Description: Collection Cyclone

Raw Material/Fuel: Metal

Rated Capacity: 300 lb./day

### **Applicable Requirements**

#### **Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)**

*The emissions from this emission point shall not exceed the levels specified below.*

Pollutant: Opacity

Emission Limit(s): 40%<sup>(1)</sup>

Authority for Requirement: Iowa DNR Construction Permit 04-A-291  
567 IAC 23.3(2)"d"

<sup>(1)</sup> Per DNR Air Quality Policy 3-b-08, Opacity Limits, an exceedance of the indicator opacity of (25%) will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. The permit holder shall also file an "indicator opacity exceedance report" with the DNR field office and keep records as required in the policy. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing).

Pollutant: Particulate Matter (PM)

Emission Limit(s): 0.1 gr./scf

Authority for Requirement: Iowa DNR Construction Permits 04-A-291  
567 IAC 23.3(2)"a"

Pollutant: PM<sub>10</sub>

Emission Limits: 3.69 lb./hr

Authority for Requirement: Iowa DNR Construction Permit 04-A-291

### **Operational Limits & Requirements**

*The owner/operator of this equipment shall comply with the operational limits and requirements listed below.*

Hours of operation:

A. The use of the metal atomizer shall not exceed 7,500 hours on a 12-month rolling total.

Reporting & Record keeping: All records as required by this permit shall be kept on-site for a minimum of two (2) years and shall be available for inspection by the DNR. Records shall be legible and maintained in an orderly manner.

A. The facility shall record the hours of operation of this emission unit for each day of operation and the 12-month rolling total hours of operation.

Authority for Requirement: Iowa DNR Construction Permit 04-A-291

### **Emission Point Characteristics**

*The emission point shall conform to the specifications listed below.*

Stack Height, (ft, from the ground): 32.8

Stack Opening, (inches, dia.): 4.375

Exhaust Flow Rate (scfm): 4,300

Exhaust Temperature (°F): Ambient

Discharge Style: Vertical Unobstructed

Authority for Requirement: Iowa DNR Construction Permit 04-A-291

The temperature and flow rate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

**Monitoring Requirements**

*The owner/operator of this equipment shall comply with the monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required?**

Yes ☐ No ☒

**Facility Maintained Operation & Maintenance Plan Required?**

Yes ☐ No ☒

Authority for Requirement: 567 IAC 22.108(3)



## **Emission Point ID Number: EP250**

### Associated Equipment

Associated Emission Unit ID Number: EU250

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Emission Unit vented through this Emission Point: EU250  
Emission Unit Description: Parks Library Non-Aqueous Deacidification System  
Raw Material/Fuel: Wei To Soft Spray  
Rated Capacity: 0.0571 gal./hr

### **Applicable Requirements**

#### **Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)**

*The emissions from this emission point shall not exceed the levels specified below.*

There are no emission limits at this time.

#### **Emission Point Characteristics**

*The emission point shall conform to the specifications listed below.*

Stack Height, (ft, from the ground): 60.6  
Stack Opening, (inches, dia.): 24  
Exhaust Flow Rate (scfm): 4,606  
Exhaust Temperature (°F): Ambient  
Discharge Style: Vertically Obstructed  
Authority for Requirement: Iowa DNR Construction Permit 03-A-1058

The temperature and flow rate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

#### **Monitoring Requirements**

*The owner/operator of this equipment shall comply with the monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required?** Yes ☐ No ☒

**Facility Maintained Operation & Maintenance Plan Required?** Yes ☐ No ☒

Authority for Requirement: 567 IAC 22.108(3)

## **Emission Point ID Number: EP256**

### Associated Equipment

Associated Emission Unit ID Numbers: EU256

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Emission Unit vented through this Emission Point: EU256

Emission Unit Description: Walk-In Fume Hood

Raw Material/Fuel: Waste Solvents

Rated Capacity: 55.0 gal./hr

### **Applicable Requirements**

#### **Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)**

*The emissions from this emission point shall not exceed the levels specified below.*

There are no emission limits at this time.

#### **Operational Limits & Requirements**

*The owner/operator of this equipment shall comply with the operational limits and requirements listed below.*

#### **Reporting & Record keeping:**

All records as required by this permit shall be kept on-site for the lifetime of the equipment and shall be available for inspection by the DNR. Records shall be legible and maintained in an orderly manner.

- A. The facility is required to provide documentation at the plant site to support the initial determination of the total annual HAP quantity of the off-site material. This documentation shall include identification of each off-site material management unit selected by the owner or operator to be exempted under paragraph (c)(2) of § 63.683 and the basis for determining the HAP content of the off-site material.
- B. Each of the off-site material management units exempted under paragraph (c)(2) of § 63.683 shall be permanently marked in such a manner that it can be readily identified as an exempted unit from the other off-site material management units located at the plant site.

Authority for Requirement: Iowa DNR Construction Permit 03-A-1059

40 CFR 63.683(c)(2)

567 23.1(4)"ad"

**Emission Point Characteristics**

*The emission point shall conform to the specifications listed below.*

Stack Height, (ft, from the ground): 23

Stack Opening, (inches, dia.): 22

Exhaust Flow Rate (scfm): 3,053

Exhaust Temperature (°F): Ambient

Discharge Style: Vertically Obstructed

Authority for Requirement: Iowa DNR Construction Permit 03-A-1059

The temperature and flow rate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point design characteristics are different than the values stated above, the owner/operator must notify the Department and obtain a permit amendment, if required.

**Monitoring Requirements**

*The owner/operator of this equipment shall comply with the monitoring requirements listed below.*

**Agency Approved Operation & Maintenance Plan Required?**

Yes ☐ No ☒

**Facility Maintained Operation & Maintenance Plan Required?**

Yes ☐ No ☒

Authority for Requirement: 567 IAC 22.108(3)

## IV. General Conditions

This permit is issued under the authority of the Iowa Code subsection 455B.133(8) and in accordance with 567 Iowa Administrative Code chapter 22.

### G1. Duty to Comply

1. The permittee must comply with all conditions of the Title V permit. Any permit noncompliance constitutes a violation of the Act and is grounds for enforcement action; for a permit termination, revocation and reissuance, or modification; or for denial of a permit renewal application. *567 IAC 22.108(9)"a"*
2. Any compliance schedule shall be supplemental to, and shall not sanction noncompliance with, the applicable requirements on which it is based. *567 IAC 22.105 (2)"h"(3)*
3. Where an applicable requirement of the Act is more stringent than an applicable requirement of regulations promulgated under Title IV of the Act, both provisions shall be enforceable by the administrator and are incorporated into this permit. *567 IAC 22.108 (1)"b"*
4. Unless specified as either "state enforceable only" or "local program enforceable only", all terms and conditions in the permit, including provisions to limit a source's potential to emit, are enforceable by the administrator and citizens under the Act. *567 IAC 22.108 (14)*
5. It shall not be a defense for a permittee, in an enforcement action, that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of the permit. *567 IAC 22.108 (9)"b"*

### G2. Permit Expiration

1. Except as provided in 567 IAC 22.104, the expiration of this permit terminates the permittee's right to operate unless a timely and complete application has been submitted for renewal. Any testing required for renewal shall be completed before the application is submitted. *567 IAC 22.116(2)*
2. To be considered timely, the owner, operator, or designated representative (where applicable) of each source required to obtain a Title V permit shall present or mail the Air Quality Bureau, Iowa Department of Natural Resources, Air Quality Bureau, 7900 Hickman Rd, Suite #1, Urbandale, Iowa 50322, two copies (three if your facility is located in Linn or Polk county) of a complete permit application, at least 6 months but not more than 18 months prior to the date of permit expiration. An additional copy must also be sent to EPA Region VII, Attention: Chief of Air Permits, 901 N. 5th St., Kansas City, KS 66101. The application must include all emission points, emission units, air pollution control equipment, and monitoring devices at the facility. All emissions generating activities, including fugitive emissions, must be included. The definition of a complete application is as indicated in 567 IAC 22.105(2). *567 IAC 22.105*

### G3. Certification Requirement for Title V Related Documents

Any application, report, compliance certification or other document submitted pursuant to this permit shall contain certification by a responsible official of truth, accuracy, and completeness. All certifications shall state that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete. *567 IAC 22.107 (4)*

### G4. Annual Compliance Certification

By March 31 of each year, the permittee shall submit compliance certifications for the previous calendar year. The certifications shall include descriptions of means to monitor the compliance status of all emissions sources including emissions limitations, standards, and work practices in accordance with applicable requirements. The certification for a source shall include the identification of each term or condition of the permit that is the basis of the certification; the compliance status; whether compliance was continuous or intermittent; the method(s) used for determining the compliance status

of the source, currently and over the reporting period consistent with all applicable department rules. For sources determined not to be in compliance at the time of compliance certification, a compliance schedule shall be submitted which provides for periodic progress reports, dates for achieving activities, milestones, and an explanation of why any dates were missed and preventive or corrective measures. The compliance certification shall be submitted to the administrator, director, and the appropriate DNR Field office. *567 IAC 22.108 (15)"e"*

#### **G5. Semi-Annual Monitoring Report**

By March 31 and September 30 of each year, the permittee shall submit a report of any monitoring required under this permit for the 6 month periods of July 1 to December 31 and January 1 to June 30, respectively. All instances of deviations from permit requirements must be clearly identified in these reports, and the report must be signed by a responsible official, consistent with 567 IAC 22.107(4). The semi-annual monitoring report shall be submitted to the director and the appropriate DNR Field office. *567 IAC 22.108 (5)*

#### **G6. Annual Fee**

1. The permittee is required under subrule 567 IAC 22.106 to pay an annual fee based on the total tons of actual emissions of each regulated air pollutant. Beginning July 1, 1996, Title V operating permit fees will be paid on July 1 of each year. The fee shall be based on emissions for the previous calendar year.
2. The fee amount shall be calculated based on the first 4,000 tons of each regulated air pollutant emitted each year. The fee to be charged per ton of pollutant will be available from the department by June 1 of each year. The Responsible Official will be advised of any change in the annual fee per ton of pollutant.
3. The following forms shall be submitted annually by March 31 documenting actual emissions for the previous calendar year.
  - a. Form 1.0 "Facility Identification";
  - b. Form 4.0 "Emissions unit-actual operations and emissions" for each emission unit;
  - c. Form 5.0 "Title V annual emissions summary/fee"; and
  - d. Part 3 "Application certification."
4. The fee shall be submitted annually by July 1. The fee shall be submitted with the following forms:
  - a. Form 1.0 "Facility Identification";
  - b. Form 5.0 "Title V annual emissions summary/fee";
  - c. Part 3 "Application certification."
5. If there are any changes to the emission calculation form, the department shall make revised forms available to the public by January 1. If revised forms are not available by January 1, forms from the previous year may be used and the year of emissions documented changed. The department shall calculate the total statewide Title V emissions for the prior calendar year and make this information available to the public no later than April 30 of each year.
6. Phase I acid rain affected units under section 404 of the Act shall not be required to pay a fee for emissions which occur during the years 1993 through 1999 inclusive.
7. The fee for a portable emissions unit or stationary source which operates both in Iowa and out of state shall be calculated only for emissions from the source while operating in Iowa.
8. Failure to pay the appropriate Title V fee represents cause for revocation of the Title V permit as indicated in 567 IAC 22.115(1)"d".

### **G7. Inspection of Premises, Records, Equipment, Methods and Discharges**

Upon presentation of proper credentials and any other documents as may be required by law, the permittee shall allow the director or the director's authorized representative to:

1. Enter upon the permittee's premises where a Title V source is located or emissions-related activity is conducted, or where records must be kept under the conditions of the permit;
2. Have access to and copy, at reasonable times, any records that must be kept under the conditions of the permit;
3. Inspect, at reasonable times, any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under the permit; and
4. Sample or monitor, at reasonable times, substances or parameters for the purpose of ensuring compliance with the permit or other applicable requirements. *567 IAC 22.108 (15)"b"*

### **G8. Duty to Provide Information**

The permittee shall furnish to the director, within a reasonable time, any information that the director may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating the permit or to determine compliance with the permit. Upon request, the permittee also shall furnish to the director copies of records required to be kept by the permit, or for information claimed to be confidential, the permittee shall furnish such records directly to the administrator of EPA along with a claim of confidentiality. *567 IAC 22.108 (9)"e"*

### **G9. General Maintenance and Repair Duties**

The owner or operator of any air emission source or control equipment shall:

1. Maintain and operate the equipment or control equipment at all times in a manner consistent with good practice for minimizing emissions.
2. Remedy any cause of excess emissions in an expeditious manner.
3. Minimize the amount and duration of any excess emission to the maximum extent possible during periods of such emissions. These measures may include but not be limited to the use of clean fuels, production cutbacks, or the use of alternate process units or, in the case of utilities, purchase of electrical power until repairs are completed.
4. Schedule, at a minimum, routine maintenance of equipment or control equipment during periods of process shutdowns to the maximum extent possible. *567 IAC 24.2(1)*

### **G10. Recordkeeping Requirements for Compliance Monitoring**

1. In addition to any source specific recordkeeping requirements contained in this permit, the permittee shall maintain the following compliance monitoring records, where applicable:

- a. The date, place and time of sampling or measurements
- b. The date the analyses were performed.
- c. The company or entity that performed the analyses.
- d. The analytical techniques or methods used.
- e. The results of such analyses; and
- f. The operating conditions as existing at the time of sampling or measurement.
- g. The records of quality assurance for continuous compliance monitoring systems (including but not limited to quality control activities, audits and calibration drifts.)

2. The permittee shall retain records of all required compliance monitoring data and support information for a period of at least 5 years from the date of compliance monitoring sample, measurement report or application. Support information includes all calibration and maintenance records and all original strip chart recordings for continuous compliance monitoring, and copies of all reports required by the permit.

3. For any source which in its application identified reasonably anticipated alternative operating scenarios, the permittee shall:

- a. Comply with all terms and conditions of this permit specific to each alternative scenario.
- b. Maintain a log at the permitted facility of the scenario under which it is operating.
- c. Consider the permit shield, if provided in this permit, to extend to all terms and conditions under each operating scenario. *567 IAC 22.108(4), 567 IAC 22.108(12)*

**G11. Evidence used in establishing that a violation has or is occurring.**

Notwithstanding any other provisions of these rules, any credible evidence may be used for the purpose of establishing whether a person has violated or is in violation of any provisions herein.

1. Information from the use of the following methods is presumptively credible evidence of whether a violation has occurred at a source:

- a. A monitoring method approved for the source and incorporated in an operating permit pursuant to 567 Chapter 22;
- b. Compliance test methods specified in 567 Chapter 25; or
- c. Testing or monitoring methods approved for the source in a construction permit issued pursuant to 567 Chapter 22.

2. The following testing, monitoring or information gathering methods are presumptively credible testing, monitoring, or information gathering methods:

- a. Any monitoring or testing methods provided in these rules; or
- b. Other testing, monitoring, or information gathering methods that produce information comparable to that produced by any method in subrule 21.5(1) or this subrule. *567 IAC 21.5(1)-567 IAC 21.5(2)*

**G12. Prevention of Accidental Release: Risk Management Plan Notification and Compliance Certification**

If the permittee is required to develop and register a risk management plan pursuant to section 112(r) of the Act, the permittee shall notify the department of this requirement. The plan shall be filed with all appropriate authorities by the deadline specified by EPA. A certification that this risk management plan is being properly implemented shall be included in the annual compliance certification of this permit. *567 IAC 22.108(6)*

**G13. Hazardous Release**

The permittee must report any situation involving the actual, imminent, or probable release of a hazardous substance into the atmosphere which, because of the quantity, strength and toxicity of the substance, creates an immediate or potential danger to the public health, safety or to the environment. A verbal report shall be made to the department at (515) 281-8694 and to the local police department or the office of the sheriff of the affected county as soon as possible but not later than six hours after the discovery or onset of the condition. This verbal report must be followed up with a written report as indicated in 567 IAC 131.2(2). *567 IAC Chapter 131-State Only*

**G14. Excess Emissions and Excess Emissions Reporting Requirements**

1. Excess Emissions. Excess emission during a period of startup, shutdown, or cleaning of control equipment is not a violation of the emission standard if the startup, shutdown or cleaning is accomplished expeditiously and in a manner consistent with good practice for minimizing emissions. Cleaning of control equipment which does not require the shutdown of the process equipment shall be limited to one six-minute period per one-hour period. An incident of excess emission (other than an incident during startup, shutdown or cleaning of control equipment) is a violation. If the owner or operator of a source maintains that the incident of excess emission was due to a malfunction, the owner or operator must show that the conditions which caused the incident of excess emission were not preventable by reasonable maintenance and control measures. Determination of any subsequent enforcement action will be made following review of this report. If excess emissions are occurring, either the control equipment causing the excess emission shall be repaired in an expeditious manner or

the process generating the emissions shall be shutdown within a reasonable period of time. An expeditious manner is the time necessary to determine the cause of the excess emissions and to correct it within a reasonable period of time. A reasonable period of time is eight hours plus the period of time required to shut down the process without damaging the process equipment or control equipment. In the case of an electric utility, a reasonable period of time is eight hours plus the period of time until comparable generating capacity is available to meet consumer demand with the affected unit out of service, unless, the director shall, upon investigation, reasonably determine that continued operation constitutes an unjustifiable environmental hazard and issue an order that such operation is not in the public interest and require a process shutdown to commence immediately.

## 2. Excess Emissions Reporting

a. Oral Reporting of Excess Emissions. An incident of excess emission (other than an incident of excess emission during a period of startup, shutdown, or cleaning) shall be reported to the appropriate field office of the department within eight hours of, or at the start of the first working day following the onset of the incident. The reporting exemption for an incident of excess emission during startup, shutdown or cleaning does not relieve the owner or operator of a source with continuous monitoring equipment of the obligation of submitting reports required in 567-subrule 25.1(6). An oral report of excess emission is not required for a source with operational continuous monitoring equipment (as specified in 567-subrule 25.1(1) ) if the incident of excess emission continues for less than 30 minutes and does not exceed the applicable visible emission standard by more than 10 percent opacity. The oral report may be made in person or by telephone and shall include as a minimum the following:

- i. The identity of the equipment or source operation from which the excess emission originated and the associated stack or emission point.
- ii. The estimated quantity of the excess emission.
- iii. The time and expected duration of the excess emission.
- iv. The cause of the excess emission.
- v. The steps being taken to remedy the excess emission.
- vi. The steps being taken to limit the excess emission in the interim period.

b. Written Reporting of Excess Emissions. A written report of an incident of excess emission shall be submitted as a follow-up to all required oral reports to the department within seven days of the onset of the upset condition, and shall include as a minimum the following:

- i. The identity of the equipment or source operation point from which the excess emission originated and the associated stack or emission point.
- ii. The estimated quantity of the excess emission.
- iii. The time and duration of the excess emission.
- iv. The cause of the excess emission.
- v. The steps that were taken to remedy and to prevent the recurrence of the incident of excess emission.
- vi. The steps that were taken to limit the excess emission.
- vii. If the owner claims that the excess emission was due to malfunction, documentation to support this claim. 567 IAC 24.1(1)-567 IAC 24.1(4)

3. Emergency Defense for Excess Emissions. For the purposes of this permit, an “emergency” means any situation arising from sudden and reasonably unforeseeable events beyond the control of the source, including acts of God, which requires immediate corrective action to restore normal operation, and that causes the source to exceed a technology-based emission limitation under the permit due to unavoidable increases in emissions attributable to the emergency. An emergency shall not include non-compliance, to the extent caused by improperly designed equipment, lack of preventive maintenance,



careless or improper operation or operator error. An emergency constitutes an affirmative defense to an action brought for non-compliance with technology based limitations if it can be demonstrated through properly signed contemporaneous operating logs or other relevant evidence that:

- a. An emergency occurred and that the permittee can identify the cause(s) of the emergency;
- b. The facility at the time was being properly operated;
- c. During the period of the emergency, the permittee took all reasonable steps to minimize levels of emissions that exceeded the emissions standards or other requirements of the permit; and
- d. The permittee submitted notice of the emergency to the director by certified mail within two working days of the time when the emissions limitations were exceeded due to the emergency. This notice must contain a description of the emergency, any steps taken to mitigate emissions, and corrective actions taken. *567 IAC 22.108(16)*

#### **G15. Permit Deviation Reporting Requirements**

A deviation is any failure to meet a term, condition or applicable requirement in the permit. Reporting requirements for deviations that result in a hazardous release or excess emissions have been indicated above (see G13 and G14). Unless more frequent deviation reporting is specified in the permit, any other deviation shall be documented in the semi-annual monitoring report and the annual compliance certification (see G4 and G5). *567 IAC 22.108(5)"b"*

#### **G16. Notification Requirements for Sources That Become Subject to NSPS and NESHAP Regulations**

During the term of this permit, the permittee must notify the department of any source that becomes subject to a standard or other requirement under 567-subrule 23.1(2) (standards of performance of new stationary sources) or section 111 of the Act; or 567-subrule 23.1(3) (emissions standards for hazardous air pollutants), 567-subrule 23.1(4) (emission standards for hazardous air pollutants for source categories) or section 112 of the Act. This notification shall be submitted in writing to the department pursuant to the notification requirements in 40 CFR Section 60.7, 40 CFR Section 61.07, and/or 40 CFR Section 63.9. *567 IAC 23.1(2), 567 IAC 23.1(3), 567 IAC 23.1(4)*

#### **G17. Requirements for Making Changes to Emission Sources That Do Not Require Title V Permit Modification**

1. Off Permit Changes to a Source. Pursuant to section 502(b)(10) of the CAAA, the permittee may make changes to this installation/facility without revising this permit if:

- a. The changes are not major modifications under any provision of any program required by section 110 of the Act, modifications under section 111 of the act, modifications under section 112 of the act, or major modifications as defined in 567 IAC Chapter 22.
- b. The changes do not exceed the emissions allowable under the permit (whether expressed therein as a rate of emissions or in terms of total emissions);
- c. The changes are not modifications under any provisions of Title I of the Act and the changes do not exceed the emissions allowable under the permit (whether expressed therein as a rate of emissions or as total emissions);
- d. The changes are not subject to any requirement under Title IV of the Act.
- e. The changes comply with all applicable requirements.
- f. For such a change, the permitted source provides to the department and the administrator by certified mail, at least 30 days in advance of the proposed change, a written notification, including the following, which must be attached to the permit by the source, the department and the administrator:
  - i. A brief description of the change within the permitted facility,
  - ii. The date on which the change will occur,

- iii. Any change in emission as a result of that change,
  - iv. The pollutants emitted subject to the emissions trade
  - v. If the emissions trading provisions of the state implementation plan are invoked, then Title V permit requirements with which the source shall comply; a description of how the emissions increases and decreases will comply with the terms and conditions of the Title V permit.
  - vi. A description of the trading of emissions increases and decreases for the purpose of complying with a federally enforceable emissions cap as specified in and in compliance with the Title V permit; and
  - vii. Any permit term or condition no longer applicable as a result of the change.
- 567 IAC 22.110(1)*

2. Such changes do not include changes that would violate applicable requirements or contravene federally enforceable permit terms and conditions that are monitoring (including test methods), record keeping, reporting, or compliance certification requirements. *567 IAC 22.110(2)*
3. Notwithstanding any other part of this rule, the director may, upon review of a notice, require a stationary source to apply for a Title V permit if the change does not meet the requirements of subrule 22.110(1). *567 IAC 22.110(3)*
4. The permit shield provided in subrule 22.108(18) shall not apply to any change made pursuant to this rule. Compliance with the permit requirements that the source will meet using the emissions trade shall be determined according to requirements of the state implementation plan authorizing the emissions trade. *567 IAC 22.110(4)*
5. No permit revision shall be required, under any approved economic incentives, marketable permits, emissions trading and other similar programs or processes, for changes that are provided for in this permit. *567 IAC 22.108(11)*

#### **G18. Duty to Modify a Title V Permit**

##### **1. Administrative Amendment.**

- a. An administrative permit amendment is a permit revision that is required to do any of the following:
  - i. Correct typographical errors
  - ii. Identify a change in the name, address, or telephone number of any person identified in the permit, or provides a similar minor administrative change at the source;
  - iii. Require more frequent monitoring or reporting by the permittee; or
  - iv. Allow for a change in ownership or operational control of a source where the director determines that no other change in the permit is necessary, provided that a written agreement containing a specific date for transfer of permit responsibility, coverage and liability between the current and new permittee has been submitted to the director.
- b. The permittee may implement the changes addressed in the request for an administrative amendment immediately upon submittal of the request. The request shall be submitted to the director.
- c. Administrative amendments to portions of permits containing provisions pursuant to Title IV of the Act shall be governed by regulations promulgated by the administrator under Title IV of the Act.

##### **2. Minor Permit Modification.**

- a. Minor permit modification procedures may be used only for those permit modifications that do any of the following:

- i. Do not violate any applicable requirements
  - ii. Do not involve significant changes to existing monitoring, reporting or recordkeeping requirements in the Title V permit.
  - iii. Do not require or change a case by case determination of an emission limitation or other standard, or increment analysis.
  - iv. Do not seek to establish or change a permit term or condition for which there is no corresponding underlying applicable requirement and that the source has assumed in order to avoid an applicable requirement to which the source would otherwise be subject. Such terms and conditions include any federally enforceable emissions caps which the source would assume to avoid classification as a modification under any provision under Title I of the Act; and an alternative emissions limit approved pursuant to regulations promulgated under section 112(i)(5) of the Act.;
  - v. Are not modifications under any provision of Title I of the Act; and
  - vi. Are not required to be processed as significant modification.
- b. An application for minor permit revision shall be on the minor Title V modification application form and shall include at least the following:
- i. A description of the change, the emissions resulting from the change, and any new applicable requirements that will apply if the change occurs.
  - ii. The permittee's suggested draft permit
  - iii. Certification by a responsible official, pursuant to 567 IAC 22.107(4), that the proposed modification meets the criteria for use of a minor permit modification procedures and a request that such procedures be used; and
  - iv. Completed forms to enable the department to notify the administrator and the affected states as required by 567 IAC 22.107(7).
- c. The permittee may make the change proposed in its minor permit modification application immediately after it files the application. After the permittee makes this change and until the director takes any of the actions specified in 567 IAC 22.112(4) "a" to "c", the permittee must comply with both the applicable requirements governing the change and the proposed permit terms and conditions. During this time, the permittee need not comply with the existing permit terms and conditions it seeks to modify. However, if the permittee fails to comply with its proposed permit terms and conditions during this time period, existing permit term terms and conditions it seeks to modify may subject the facility to enforcement action.

3. Significant Permit Modification. Significant Title V modification procedures shall be used for applications requesting Title V permit modifications that do not qualify as minor Title V modifications or as administrative amendments. These include but are not limited to all significant changes in monitoring permit terms, every relaxation of reporting or recordkeeping permit terms, and any change in the method of measuring compliance with existing requirements. Significant Title V modifications shall meet all requirements of 567 IAC Chapter 22, including those for applications, public participation, review by affected states, and review by the administrator, and those requirements that apply to Title V issuance and renewal. 567 IAC 22.111-567 IAC 22.113 The permittee shall submit an application for a significant permit modification not later than three months after commencing operation of the changed source unless the existing Title V permit would prohibit such construction or change in operation, in which event the operation of the changed source may not commence until the department revises the permit. 567 IAC 22.105(1)"a"(4)

#### **G19. Duty to Obtain Construction Permits**

Unless exempted under 567 IAC 22.1(2), the permittee must not construct, install, reconstruct, or alter any equipment, control equipment or anaerobic lagoon without first obtaining a construction permit, conditional permit, or permit pursuant to 567 IAC 22.8, or permits required pursuant to 567 IAC 22.4 and 567 IAC 22.5. Such permits shall be obtained prior to the initiation of construction, installation or alteration of any portion of the stationary source. *567 IAC 22.1(1)*

#### **G20. Asbestos**

The permittee shall comply with 567 IAC 23.1(3)"a", and 567 IAC 23.2(3)"g" when conducting any renovation or demolition activities at the facility. *567 IAC 23.1(3)"a", and 567 IAC 23.2*

#### **G21. Open Burning**

The permittee is prohibited from conducting open burning, except as may be allowed by 567 IAC 23.2. *567 IAC 23.2 except 23.2(3)"h"; 567 IAC 23.2(3)"h" - State Only*

#### **G22. Acid Rain (Title IV) Emissions Allowances**

The permittee shall not exceed any allowances that it holds under Title IV of the Act or the regulations promulgated there under. Annual emissions of sulfur dioxide in excess of the number of allowances to emit sulfur dioxide held by the owners and operators of the unit or the designated representative of the owners and operators is prohibited. Exceedences of applicable emission rates are prohibited. "Held" in this context refers to both those allowances assigned to the owners and operators by USEPA, and those allowances supplementally acquired by the owners and operators. The use of any allowance prior to the year for which it was allocated is prohibited. Contravention of any other provision of the permit is prohibited. *567 IAC 22.108(7)*

#### **G23. Stratospheric Ozone and Climate Protection (Title VI) Requirements**

1. The permittee shall comply with the standards for labeling of products using ozone-depleting substances pursuant to 40 CFR Part 82, Subpart E:

- a. All containers in which a class I or class II substance is stored or transported, all products containing a class I substance, and all products directly manufactured with a class I substance must bear the required warning statement if it is being introduced into interstate commerce pursuant to § 82.106.
- b. The placement of the required warning statement must comply with the requirements pursuant to § 82.108.
- c. The form of the label bearing the required warning statement must comply with the requirements pursuant to § 82.110.
- d. No person may modify, remove, or interfere with the required warning statement except as described in § 82.112.

2. The permittee shall comply with the standards for recycling and emissions reduction pursuant to 40 CFR Part 82, Subpart F, except as provided for MVACs in Subpart B:

- a. Persons opening appliances for maintenance, service, repair, or disposal must comply with the required practices pursuant to § 82.156.
- b. Equipment used during the maintenance, service, repair, or disposal of appliances must comply with the standards for recycling and recovery equipment pursuant to § 82.158.
- c. Persons performing maintenance, service, repair, or disposal of appliances must be certified by an approved technician certification program pursuant to § 82.161.
- d. Persons disposing of small appliances, MVACs, and MVAC-like appliances must comply with reporting and recordkeeping requirements pursuant to § 82.166. ("MVAC-like appliance" as defined at § 82.152)
- e. Persons owning commercial or industrial process refrigeration equipment must comply with the leak repair requirements pursuant to § 82.156.

- f. Owners/operators of appliances normally containing 50 or more pounds of refrigerant must keep records of refrigerant purchased and added to such appliances pursuant to § 82.166.
3. If the permittee manufactures, transforms, imports, or exports a class I or class II substance, the permittee is subject to all the requirements as specified in 40 CFR part 82, Subpart A, Production and Consumption Controls.
4. If the permittee performs a service on motor (fleet) vehicles when this service involves ozone-depleting substance refrigerant (or regulated substitute substance) in the motor vehicle air conditioner (MVAC), the permittee is subject to all the applicable requirements as specified in 40 CFR part 82, Subpart B, Servicing of Motor Vehicle Air Conditioners. The term "motor vehicle" as used in Subpart B does not include a vehicle in which final assembly of the vehicle has not been completed. The term "MVAC" as used in Subpart B does not include the air-tight sealed refrigeration system used as refrigerated cargo, or system used on passenger buses using HCFC-22 refrigerant,
5. The permittee shall be allowed to switch from any ozone-depleting substance to any alternative that is listed in the Significant New Alternatives Program (SNAP) promulgated pursuant to 40 CFR part 82, Subpart G, Significant New Alternatives Policy Program. *40 CFR part 82*

#### **G24. Permit Reopenings**

1. This permit may be modified, revoked, reopened, and reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance does not stay any permit condition. *567 IAC 22.108(9)"c"*
2. Additional applicable requirements under the Act become applicable to a major part 70 source with a remaining permit term of 3 or more years. Revisions shall be made as expeditiously as practicable, but not later than 18 months after the promulgation of such standards and regulations.
- a. Reopening and revision on this ground is not required if the permit has a remaining term of less than three years;
  - b. Reopening and revision on this ground is not required if the effective date of the requirement is later than the date on which the permit is due to expire, unless the original permit or any of its terms and conditions have been extended pursuant to 40 CFR 70.4(b)(10)(i) or (ii) as amended to June 25, 1993.
  - c. Reopening and revision on this ground is not required if the additional applicable requirements are implemented in a general permit that is applicable to the source and the source receives approval for coverage under that general permit. *567 IAC 22.108(17)"a", 567 IAC 22.108(17)"b"*

3. A permit shall be reopened and revised under any of the following circumstances:
  - a. The department receives notice that the administrator has granted a petition for disapproval of a permit pursuant to 40 CFR 70.8(d) as amended to June 25, 1993, provided that the reopening may be stayed pending judicial review of that determination;
  - b. The department or the administrator determines that the Title V permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of the Title V permit;
  - c. Additional applicable requirements under the Act become applicable to a Title V source, provided that the reopening on this ground is not required if the permit has a remaining term of less than three years, the effective date of the requirement is later than the date on which the permit is due to expire, or the additional applicable requirements are implemented in a general permit that is applicable to the source and the source receives approval for coverage under that general permit. Such a reopening shall be complete not later than 18 months after promulgation of the applicable requirement.
  - d. Additional requirements, including excess emissions requirements, become applicable to a Title IV affected source under the acid rain program. Upon approval by the administrator, excess emissions offset plans shall be deemed to be incorporated into the permit.
  - e. The department or the administrator determines that the permit must be revised or revoked to ensure compliance by the source with the applicable requirements. *567 IAC 22.114(1)*
4. Proceedings to reopen and reissue a Title V permit shall follow the procedures applicable to initial permit issuance and shall effect only those parts of the permit for which cause to reopen exists. *567 IAC 22.114(2)*

#### **G25. Permit Shield**

1. The director may expressly include in a Title V permit a provision stating that compliance with the conditions of the permit shall be deemed compliance with any applicable requirements as of the date of permit issuance, provided that:
  - a. Such applicable requirements are included and are specifically identified in the permit; or
  - b. The director, in acting on the permit application or revision, determines in writing that other requirements specifically identified are not applicable to the source, and the permit includes the determination or a concise summary thereof.
2. A Title V permit that does not expressly state that a permit shield exists shall be presumed not to provide such a shield.
3. A permit shield shall not alter or affect the following:
  - a. The provisions of Section 303 of the Act (emergency orders), including the authority of the administrator under that section;
  - b. The liability of an owner or operator of a source for any violation of applicable requirements prior to or at the time of permit issuance;
  - c. The applicable requirements of the acid rain program, consistent with Section 408(a) of the Act;
  - d. The ability of the department or the administrator to obtain information from the facility pursuant to Section 114 of the Act. *567 IAC 22.108 (18)*

#### **G26. Severability**

The provisions of this permit are severable and if any provision or application of any provision is found to be invalid by this department or a court of law, the application of such provision to other circumstances, and the remainder of this permit, shall not be affected by such finding. *567 IAC 22.108 (8)*

#### **G27. Property Rights**

The permit does not convey any property rights of any sort, or any exclusive privilege. *567 IAC 22.108 (9)"d"*

**G28. Transferability**

This permit is not transferable from one source to another. If title to the facility or any part of it is transferred, an administrative amendment to the permit must be sought to determine transferability of the permit. *567 IAC 22.111 (1)"d"*

**G29. Disclaimer**

No review has been undertaken on the engineering aspects of the equipment or control equipment other than the potential of that equipment for reducing air contaminant emissions. *567 IAC 22.3(3)"c"*

**G30. Notification and Reporting Requirements for Stack Tests or Monitor Certification**

The permittee shall notify the department's stack test contact in writing not less than 30 days before a required test or performance evaluation of a continuous emission monitor is performed to determine compliance with an applicable requirement. For the department to consider test results a valid demonstration of compliance with applicable rules or a permit condition, such notice shall be given. Such notice shall include the time, the place, the name of the person who will conduct the test and other information as required by the department. Unless specifically waived by the department's stack test contact, a pretest meeting shall be held not later than 15 days prior to conducting the compliance demonstration. The department may accept a testing protocol in lieu of a pretest meeting. A representative of the department shall be permitted to witness the tests. Results of the tests shall be submitted in writing to the department's stack test contact in the form of a comprehensive report within six weeks of the completion of the testing. Compliance tests conducted pursuant to this permit shall be conducted with the source operating in a normal manner at its maximum continuous output as rated by the equipment manufacturer, or the rate specified by the owner as the maximum production rate at which the source shall be operated. In cases where compliance is to be demonstrated at less than the maximum continuous output as rated by the equipment manufacturer, and it is the owner's intent to limit the capacity to that rating, the owner may submit evidence to the department that the source has been physically altered so that capacity cannot be exceeded, or the department may require additional testing, continuous monitoring, reports of operating levels, or any other information deemed necessary by the department to determine whether such source is in compliance.

Stack test notifications, reports and correspondence shall be sent to:

Stack Test Review Coordinator  
Iowa DNR, Air Quality Bureau  
7900 Hickman Road, Suite #1  
Urbandale, IA 50322  
(515) 242-6001

Within Polk and Linn Counties, stack test notifications, reports and correspondence shall also be directed to the supervisor of the respective county air pollution program.

*567 IAC 25.1(7)"a", 567 IAC 25.1(9)*

**G31. Prevention of Air Pollution Emergency Episodes**

The permittee shall comply with the provisions of 567 IAC Chapter 26 in the prevention of excessive build-up of air contaminants during air pollution episodes, thereby preventing the occurrence of an emergency due to the effects of these contaminants on the health of persons. *567 IAC 26.1(1)*

### **G32. Contacts List**

The current address and phone number for reports and notifications to the EPA administrator is:

Chief of Air Permits  
EPA Region 7  
Air Permits and Compliance Branch  
901 N. 5<sup>th</sup> Street  
Kansas City, KS 66101  
(913) 551-7020

The current address and phone number for reports and notifications to the department or the Director is:

Chief, Air Quality Bureau  
Iowa Department of Natural Resources  
7900 Hickman Road, Suite #1  
Urbandale, IA 50322  
(515) 242-5100

Reports or notifications to the DNR Field Offices or local programs shall be directed to the supervisor at the appropriate field office or local program. Current addresses and phone numbers are:

#### **Field Office 1**

909 West Main – Suite 4  
Manchester, IA 52057  
(563) 927-2640

#### **Field Office 2**

P.O. Box 1443  
2300-15th St., SW  
Mason City, IA 50401  
(641) 424-4073

#### **Field Office 3**

1900 N. Grand Ave.  
Spencer, IA 51301  
(712) 262-4177

#### **Field Office 4**

1401 Sunnyside Lane  
Atlantic, IA 50022  
(712) 243-1934

#### **Field Office 5**

401 SW 7<sup>th</sup> Street, Suite I  
Des Moines, IA 50309  
(515) 725-0268

#### **Field Office 6**

1023 West Madison Street  
Washington, IA 52353-1623  
(319) 653-2135

#### **Polk County Planning & Development**

Air Quality Division  
5885 NE 14th St.  
Des Moines, IA 50313  
(515) 286-3351

#### **Linn County Public Health Dept.**

Air Pollution Control Division  
501 13th St., NW  
Cedar Rapids, IA 52405  
(319) 892-6000



**Appendix A**  
**IDNR Air Quality Policy 3-b-08 (Opacity)**

1998 NOV 13 4

IOWA DEPARTMENT OF NATURAL RESOURCES  
ENVIRONMENTAL PROTECTION DIVISION

POLICY/PROCEDURE STATEMENT

<b>TOPIC:</b> <u>Opacity Limits</u>
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**Policy Procedure Number:**    3-b-08

**Replaces Number:**    None

**Date:**

**Effective Date:**    November 12, 1998

**Preparer:**    David Phelps

**Reviewer:**

**Approval:**    **Bureau Chief:**    Peter Hamlin

**Date:**    11/12/98

**Division Administrator:**    Allan Stokes

**Date:**    11/12/98

**Applicable Code of Iowa or Iowa Administrative Code Rule:**    23.3(2)d

**“No person shall allow, cause or permit the emission of visible air contaminants into the atmosphere from any equipment, internal combustion engine, premise fire, open fire or stack, equal to or in excess of 40 percent opacity or that level specified in a construction permit, except as provided below and in 567-Chapter 24.”**

**REASON OR BACKGROUND**

The default opacity limit allowed by regulation is 40%. This limit was established with the original regulations in 1970. It is generally accepted that opacity greater than 40% was evidence of a mass emission standard exceedence. More recently, there have been requests from facilities for limits much lower than that allowed by the regulations, in some cases less than 0.01 gr/scf to which a 40% opacity limit does not correspond. Since opacity is used as an indicator of the particulate emission rate, listing an indicated potential problem opacity that is more in line with the mass emission rate is useful. In order to have the authority to set limits lower than 40%, subrule 23.3(2)d was changed. This change allows the department the ability to set opacity limits at a level that more closely corresponds to what would be observed by the source when operating in compliance with its mass emission rate.

Except in the case where a specific opacity limit is established by rule, it has been the general policy of the Department not to take action on opacity limits directly. Rather, if it is felt that a violation of the mass emission rate exists that is not attributable to some abnormal event, a stack test would be required to verify compliance. However, the Department reserves the right to use the results of formal opacity readings as evidence of an exceedence.

## DETAILS

It shall be the policy of the Department to list the default opacity as a permit condition and in addition an indicator opacity may be listed.

For ease of proving continual compliance a source may request a 'no visible emissions' opacity limit which allows proof of compliance without having a certified opacity reading taken. In this case any visible emissions would be an exceedence.

The IDNR permit writer may list an opacity that will be a indicator of possible mass emission rate exceedence. If the permittee wishes, the recommended indicator opacity may be changed by demonstrating compliance with the mass emission rate during a stack test while emitting the new desired indicator opacity. If the tested mass emission rate is less than the permitted emission rate, then the desired indicator opacity may be set at a proportionally higher level than observed during the stack test.

If an opacity measurement, taken in accordance with an approved reference method for opacity, (generally USEPA Method 9 or 22) exceeds the indicator opacity then the facility will promptly investigate the source and make corrections. However, if after corrections are made the opacity continues to exceed the indicator opacity the Department may require additional proof to demonstrate compliance with the mass emissions limits.

### **Recommended indicator opacities shall be:**

<b>Grain Loading gr./scf</b>	<b>Recommended Indicator Opacity</b>
<0.01 gr./scf	non specified in permit *
0.01 to 0.06 gr./scf	10% Opacity
0.061 to 0.08 gr./scf	20% Opacity
0.081 to 0.1 gr./scf	25% Opacity

\* A line is added to the permit that states: "If visible emissions are observed other than start-up, shut-down, or malfunction, a stack test may be required to demonstrate compliance with the particulate standard."

If a source is a batch process the indicator opacity shall be based on the table above, but the opacity averaging period, for comparison to the indicator opacity, shall be the entire batch cycle. For purposes of comparison the indicator opacity readings shall be taken during the entire cycle and averaged.

Sources are also given the opportunity to set source specific limits to be coordinated with the initial compliance test. These may then be incorporated into the permit.

In all cases an exceedence of the indicator opacity will require the permittee to file an "indicator opacity exceedence report" to the IDNR regional office. The reporting requirements shall be:

*Oral report of excess indicator opacity.* An incident of excess indicator opacity (other than an incident of excess indicator opacity during a period of startup, shutdown, or cleaning) shall be reported to the appropriate regional office of the department within eight hours of, or at the start of the first working day following the onset of the of the incident. The reporting exemption for an incident of excess indicator opacity during startup and shutdown or cleaning does not relieve the owner or operator of a source with continuous monitoring equipment of the obligation of submitting reports required in subrule 25.1(6).

An oral report of excess indicator opacity is not required for a source with operational continuous monitoring equipment (as specified in subrule 25.1(1) if the incident of excess indicator opacity continues for less than 30 minutes and does not exceed the applicable visible emission standard by more than 10 percent opacity.

The oral report may be made in person or by telephone and shall include as a minimum the following:

- a) The identity of the equipment or source operation from which the excess indicator opacity originated and the associated stack or emission point.
- b) The estimated quantity of the excess indicator opacity.
- c) The time and expected duration of the excess indicator opacity.
- d) The cause of the excess indicator opacity.
- e) The steps being taken to remedy the excess indicator opacity.
- f) The steps being taken to limit the excess indicator opacity in the interim period.

*Written report of excess indicator opacity.* A written report of an incident of excess indicator opacity shall be submitted as a follow-up to all required oral reports to the department within seven (7) days of the onset of the upset condition, and shall include as a minimum the following:

- a) The identity of the equipment or source operation point from which the excess emission originate and the associated stack or emission point.
- b) The estimated quantity of the excess indicator opacity.
- c) The time and duration of the excess indicator opacity.
- d) The cause of the excess indicator opacity.
- e) The steps that were taken to remedy and to prevent the recurrence of the incident of excess indicator opacity.
- f) The steps that were taken to limit the excess indicator opacity.
- g) If the owner claims that the excess indicator opacity was due to malfunction, documentation to support this claim.

Exceptions to this policy:

- 1) In the case where a facility has an opacity limit established in an existing permit, no change will be made to that permit limit unless the permit is being modified for other purposes.
- 2) If the facility has a continuous opacity monitor, this policy shall not apply.
- 3) This policy shall not apply to opacity limits established in Prevention of Significant Deterioration (PSD) permits or permits that were established for maintenance plans for nonattainment areas.
- 4) This policy shall not apply where an opacity limit is established as an indication of hazardous air pollutants.

- 5) This policy shall not apply where an opacity limit is established by a rule, New Source Performance Standards (NSPS), National Emission Standards for Hazardous Air Pollutants (NESHAPS), etc.